

FEDERAL OPERATING PERMIT

A FEDERAL OPERATING PERMIT IS HEREBY ISSUED TO
Magellan Processing, L.P.

AUTHORIZING THE OPERATION OF
Corpus Christi Terminal
Condensate Splitter
Special Warehousing and Storage

LOCATED AT
Nueces County, Texas
Latitude 27° 48' 29" Longitude 97° 26' 12"
Regulated Entity Number: RN102536836

This permit is issued in accordance with and subject to the Texas Clean Air Act (TCAA), Chapter 382 of the Texas Health and Safety Code and Title 30 Texas Administrative Code Chapter 122 (30 TAC Chapter 122), Federal Operating Permits. Under 30 TAC Chapter 122, this permit constitutes the permit holder's authority to operate the site and emission units listed in this permit. Operations of the site and emission units listed in this permit are subject to all additional rules or amended rules and orders of the Commission pursuant to the TCAA.

This permit does not relieve the permit holder from the responsibility of obtaining New Source Review authorization for new, modified, or existing facilities in accordance with 30 TAC Chapter 116, Control of Air Pollution by Permits for New Construction or Modification.

The site and emission units authorized by this permit shall be operated in accordance with 30 TAC Chapter 122, the general terms and conditions, special terms and conditions, and attachments contained herein.

This permit shall expire five years from the date of issuance. The renewal requirements specified in 30 TAC § 122.241 must be satisfied in order to renew the authorization to operate the site and emission units.

Permit No: 03882 Issuance Date: _____

For the Commission

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General Terms and Conditions

The permit holder shall comply with all terms and conditions contained in 30 TAC § 122.143 (General Terms and Conditions), 30 TAC § 122.144 (Recordkeeping Terms and Conditions), 30 TAC § 122.145 (Reporting Terms and Conditions), and 30 TAC § 122.146 (Compliance Certification Terms and Conditions).

In accordance with 30 TAC § 122.144(1), records of required monitoring data and support information required by this permit, or any applicable requirement codified in this permit, are required to be maintained for a period of five years from the date of the monitoring report, sample, or application unless a longer data retention period is specified in an applicable requirement. The five year record retention period supersedes any less stringent retention requirement that may be specified in a condition of a permit identified in the New Source Review Authorization attachment.

If the permit holder chooses to demonstrate that this permit is no longer required, a written request to void this permit shall be submitted to the Texas Commission on Environmental Quality (TCEQ) by the Responsible Official in accordance with 30 TAC § 122.161(e). The permit holder shall comply with the permit's requirements, including compliance certification and deviation reporting, until notified by the TCEQ that this permit is voided.

The permit holder shall comply with 30 TAC Chapter 116 by obtaining a New Source Review authorization prior to new construction or modification of emission units located in the area covered by this permit.

All reports required by this permit must include in the submittal a cover letter which identifies the following information: company name, TCEQ regulated entity number, air account number (if assigned), site name, area name (if applicable), and Air Permits Division permit number(s).

Special Terms and Conditions:

Emission Limitations and Standards, Monitoring and Testing, and Recordkeeping and Reporting

1. Permit holder shall comply with the following requirements:
 - A. Emission units (including groups and processes) in the Applicable Requirements Summary attachment shall meet the limitations, standards, equipment specifications, monitoring, recordkeeping, reporting, testing, and other requirements listed in the Applicable Requirements Summary attachment to assure compliance with the permit.
 - B. The textual description in the column titled "Textual Description" in the Applicable Requirements Summary attachment is not enforceable and is not deemed as a substitute for the actual regulatory language. The Textual Description is provided for information purposes only.
 - C. A citation listed on the Applicable Requirements Summary attachment, which has a notation [G] listed before it, shall include the referenced section and subsection for all commission rules, or paragraphs for all federal and state regulations and all subordinate paragraphs, subparagraphs and clauses, subclauses, and items contained within the referenced citation as applicable requirements.

- D. When a grouped citation, notated with a [G] in the Applicable Requirements Summary, contains multiple compliance options, the permit holder must keep records of when each compliance option was used.
 - E. Emission units subject to 40 CFR Part 63, Subpart Y as identified in the attached Applicable Requirements Summary table are subject to 30 TAC Chapter 113, Subchapter C, §113.300 which incorporates the 40 CFR Part 63 Subpart by reference.
 - F. Emission units subject to 40 CFR Part 63, Subpart CC as identified in the attached Applicable Requirements Summary table are subject to 30 TAC Chapter 113, Subchapter C, §113.340 which incorporates the 40 CFR Part 63 Subpart by reference.
 - G. Emission units subject to 40 CFR Part 63, Subpart ZZZZ as identified in the attached Applicable Requirements Summary table are subject to 30 TAC Chapter 113, Subchapter C, §113.1090 which incorporates the 40 CFR Part 63 Subpart by reference.
 - H. Emission units subject to 40 CFR Part 63, Subpart EEEE as identified in the attached Applicable Requirements Summary table are subject to 30 TAC Chapter 113, Subchapter C, §113.880 which incorporates the 40 CFR Part 63 Subpart by reference.
 - I. Emission units subject to 40 CFR Part 63, Subpart DDDDD as identified in the attached Applicable Requirements Summary table are subject to 30 TAC Chapter 113, Subchapter C, §113.1130 which incorporates the 40 CFR Part 63 Subpart by reference.
2. The permit holder shall comply with the following sections of 30 TAC Chapter 101 (General Air Quality Rules):
- A. Title 30 TAC § 101.1 (relating to Definitions), insofar as the terms defined in this section are used to define the terms used in other applicable requirements
 - B. Title 30 TAC § 101.3 (relating to Circumvention)
 - C. Title 30 TAC § 101.8 (relating to Sampling), if such action has been requested by the TCEQ
 - D. Title 30 TAC § 101.9 (relating to Sampling Ports), if such action has been requested by the TCEQ
 - E. Title 30 TAC § 101.10 (relating to Emissions Inventory Requirements)
 - F. Title 30 TAC § 101.201 (relating to Emission Event Reporting and Recordkeeping Requirements)
 - G. Title 30 TAC § 101.211 (relating to Scheduled Maintenance, Start-up, and Shutdown Reporting and Recordkeeping Requirements)
 - H. Title 30 TAC § 101.221 (relating to Operational Requirements)
 - I. Title 30 TAC § 101.222 (relating to Demonstrations)

- J. Title 30 TAC § 101.223 (relating to Actions to Reduce Excessive Emissions)
3. Permit holder shall comply with the following requirements of 30 TAC Chapter 111:
- A. Visible emissions from stationary vents with a flow rate of less than 100,000 actual cubic feet per minute and constructed after January 31, 1972 that are not listed in the Applicable Requirements Summary attachment for 30 TAC Chapter 111, Subchapter A, Division 1, shall not exceed 20% opacity averaged over a six-minute period. The permit holder shall comply with the following requirements for stationary vents at the site subject to this standard:
- (i) Title 30 TAC § 111.111(a)(1)(B) (relating to Requirements for Specified Sources)
 - (ii) Title 30 TAC § 111.111(a)(1)(E)
 - (iii) Title 30 TAC § 111.111(a)(1)(F)(i), (ii), (iii), or (iv)
 - (iv) For emission units with vent emissions subject to 30 TAC § 111.111(a)(1)(B), complying with 30 TAC § 111.111(a)(1)(F)(ii), (iii), or (iv), and capable of producing visible emissions from, but not limited to, particulate matter, acid gases and NO_x, the permit holder shall also comply with the following periodic monitoring requirements for the purpose of annual compliance certification under 30 TAC § 122.146. These periodic monitoring requirements do not apply to vents that are not capable of producing visible emissions such as vents that emit only colorless VOCs; vents from non-fuming liquids; vents that provide passive ventilation, such as plumbing vents; or vent emissions from any other source that does not obstruct the transmission of light. Vents, as specified in the “Applicable Requirements Summary” attachment, that are subject to the emission limitation of 30 TAC § 111.111(a)(1)(B) are not subject to the following periodic monitoring requirements:
 - (1) An observation of stationary vents from emission units in operation shall be conducted at least once during each calendar quarter unless the emission unit is not operating for the entire quarter.
 - (2) For stationary vents from a combustion source, if an alternative to the normally fired fuel is fired for a period greater than or equal to 24 consecutive hours, the permit holder shall conduct an observation of the stationary vent for each such period to determine if visible emissions are present. If such period is greater than 3 months, observations shall be conducted once during each quarter. Supplementing the normally fired fuel with natural gas or fuel gas to increase the net heating value to the minimum required value does not constitute creation of an alternative fuel.
 - (3) Records of all observations shall be maintained.
 - (4) Visible emissions observations of emission units operated during daylight hours shall be conducted no earlier than one hour after sunrise and no later than one hour before sunset. Visible

emissions observations of emission units operated only at night must be made with additional lighting and the temporary installation of contrasting backgrounds. Visible emissions observations shall be made during times when the activities described in 30 TAC § 111.111(a)(1)(E) are not taking place. Visible emissions shall be determined with each stationary vent in clear view of the observer. The observer shall be at least 15 feet, but not more than 0.25 mile, away from each stationary vent during the observation. For outdoor locations, the observer shall select a position where the sun is not directly in the observer's eyes. When condensed water vapor is present within the plume, as it emerges from the emissions outlet, observations must be made beyond the point in the plume at which condensed water vapor is no longer visible. When water vapor within the plume condenses and becomes visible at a distance from the emissions outlet, the observation shall be evaluated at the outlet prior to condensation of water vapor. A certified opacity reader is not required for visible emissions observations.

(5) Compliance Certification:

- (a) If visible emissions are not present during the observation, the RO may certify that the source is in compliance with the applicable opacity requirement in 30 TAC § 111.111(a)(1) and (a)(1)(B).
- (b) However, if visible emissions are present during the observation, the permit holder shall either list this occurrence as a deviation on the next deviation report as required under 30 TAC § 122.145(2) or conduct the appropriate opacity test specified in 30 TAC § 111.111(a)(1)(F) as soon as practicable, but no later than 24 hours after observing visible emissions to determine if the source is in compliance with the opacity requirements. If an opacity test is performed and the source is determined to be in compliance, the RO may certify that the source is in compliance with the applicable opacity requirement. However, if an opacity test is performed and the source is determined to be out of compliance, the permit holder shall list this occurrence as a deviation on the next deviation report as required under 30 TAC § 122.145(2). The opacity test must be performed by a certified opacity reader.
- (c) Some vents may be subject to multiple visible emission or monitoring requirements. All credible data must be considered when certifying compliance with this requirement even if the observation or monitoring was performed to demonstrate compliance with a different requirement.

- B. Permit holders for sites that have materials handling, construction, roads, streets, alleys, and parking lots shall comply with the following requirements:

- (i) Title 30 TAC § 111.145 (relating to Construction and Demolition)
 - (ii) Title 30 TAC § 111.147 (relating to Roads, Streets, and Alleys)
 - (iii) Title 30 TAC § 111.149 (relating to Parking Lots)
- C. Emission limits on nonagricultural processes, except for the steam generators specified in 30 TAC § 111.153, shall comply with the following requirements:
 - (i) Emissions of PM from any source may not exceed the allowable rates as required in 30 TAC § 111.151(a) (relating to Allowable Emissions Limits)
 - (ii) Sources with an effective stack height (h_e) less than the standard effective stack height (H_e), must reduce the allowable emission level by multiplying it by $[h_e/H_e]^2$ as required in 30 TAC § 111.151(b)
 - (iii) Effective stack height shall be calculated by the equation specified in 30 TAC § 111.151(c)
- 4. For storage vessels maintaining working pressure as specified in 30 TAC Chapter 115, Subchapter B, Division 1: "Storage of Volatile Organic Compounds," the permit holder shall comply with the requirements of 30 TAC § 115.112(b)(1).
- 5. Permit holder shall comply with the following 30 TAC Chapter 115, Subchapter D requirements:
 - A. Title 30 TAC § 115.312(b)(1) (relating to Control Requirements), for emissions during Process Unit Shutdown or Turnaround
- 6. The permit holder shall comply with the following requirements for units subject to any subpart of 40 CFR Part 60, unless otherwise stated in the applicable subpart:
 - A. Title 40 CFR § 60.7 (relating to Notification and Recordkeeping)
 - B. Title 40 CFR § 60.8 (relating to Performance Tests)
 - C. Title 40 CFR § 60.11 (relating to Compliance with Standards and Maintenance Requirements)
 - D. Title 40 CFR § 60.12 (relating to Circumvention)
 - E. Title 40 CFR § 60.13 (relating to Monitoring Requirements)
 - F. Title 40 CFR § 60.14 (relating to Modification)
 - G. Title 40 CFR § 60.15 (relating to Reconstruction)
 - H. Title 40 CFR § 60.19 (relating to General Notification and Reporting Requirements)
- 7. For petroleum refinery facilities subject to 40 CFR Part 60, Subpart QQQ, the permit holder shall comply with the following requirements:
 - A. Title 40 CFR § 60.692-1(a) - (c) (relating to Standards: General)

- B. Title 40 CFR § 60.692-2(a) - (c), (e) (relating to Standards: Individual Drain Systems)
 - C. Title 40 CFR § 60.692-6(a) - (b) (relating to Standards: Delay of Repair)
 - D. Title 40 CFR § 60.692-7(a) - (b) (relating to Standards: Delay of Compliance)
 - E. Title 40 CFR § 60.693-1(a) - (d), (e)(1) - (3) (relating to Alternative Standards for Individual Drain Systems)
 - F. Title 40 CFR § 60.697(a), (b)(1) - (3) (relating to Recordkeeping Requirements), as applicable to Individual Drain Systems
 - G. Title 40 CFR § 60.697(f)(1) - (2), (g) (relating to Recordkeeping Requirements), as applicable to Individual Drain Systems
 - H. Title 40 CFR § 60.697(h) (relating to Recordkeeping Requirements), as applicable to excluded Stormwater Sewer Systems
 - I. Title 40 CFR § 60.697(i) (relating to Recordkeeping Requirements), as applicable to excluded Ancillary Equipment
 - J. Title 40 CFR § 60.698(a), and (b)(1) (relating to Reporting Requirements), as applicable to Individual Drain Systems
 - K. Title 40 CFR § 60.698(c) (relating to Reporting Requirements), for water seal breaches in Drain Systems
 - L. Title 40 CFR § 60.698(e) (relating to Reporting Requirements), as applicable to Individual Drain Systems
8. The permit holder shall comply with the following requirements for units subject to any subpart of 40 CFR Part 61, unless otherwise stated in the applicable subpart:
- A. Title 40 CFR § 61.05 (relating to Prohibited Activities)
 - B. Title 40 CFR § 61.07 (relating to Application for Approval of Construction or Modification)
 - C. Title 40 CFR § 61.09 (relating to Notification of Start-up)
 - D. Title 40 CFR § 61.10 (relating to Source Reporting and Request Waiver)
 - E. Title 40 CFR § 61.12 (relating to Compliance with Standards and Maintenance Requirements)
 - F. Title 40 CFR § 61.13 (relating to Emissions Tests and Waiver of Emission Tests)
 - G. Title 40 CFR § 61.14 (relating to Monitoring Requirements)
 - H. Title 40 CFR § 61.15 (relating to Modification)
 - I. Title 40 CFR § 61.19 (relating to Circumvention)

9. For facilities where total annual benzene quantity from waste is less than 1 megagram per year and subject to emission standards in 40 CFR Part 61, Subpart FF, the permit holder shall comply with the following requirements:
 - A. Title 40 CFR § 61.355(a)(1)(iii), (a)(2), (a)(5)(i) - (ii), (a)(6), (b), and (c)(1) - (3) (relating to Test Methods, Procedures, and Compliance Provisions), for calculation procedures
 - B. Title 40 CFR § 61.356(a) (relating to Recordkeeping Requirements)
 - C. Title 40 CFR § 61.356(b), and (b)(1) (relating to Recordkeeping Requirements)
 - D. Title 40 CFR § 61.357(a), and (b) (relating to Reporting Requirements)
10. The permit holder shall comply with the requirements of 30 TAC Chapter 113, Subchapter C, § 113.100 for units subject to any subpart of 40 CFR Part 63, unless otherwise stated in the applicable subpart.
11. For the operations pertaining to the loading and unloading of marine tank vessels specified in 40 CFR Part 63, Subpart Y, the permit holder shall comply with the following requirements (Title 30 TAC Chapter 113, Subchapter C, § 113.300 incorporated by reference):
 - A. Title 40 CFR § 63.560(c) (relating to Designation of Affected Source), for applicability of the General Provisions of Subpart A
 - B. Title 40 CFR § 63.563(a)(4) (relating to Compliance and Performance Testing), for vapor tightness requirements of the marine vessels
 - C. Title 40 CFR § 63.564(a)(1) and (d) (relating to Monitoring Requirements)
 - D. Title 40 CFR § 63.565(a) (relating to Test Methods and Procedures), for performance testing requirements
 - E. Title 40 CFR § 63.565(c) (relating to Test Methods and Procedures), for vapor tightness requirements of the marine vessels
 - F. Title 40 CFR § 63.566 (relating to Construction and Reconstruction)
 - G. Title 40 CFR § 63.567(a) - (b) and (h) - (i) (relating to Reporting and Recordkeeping Requirements)
12. For sources subject to emission standards in 40 CFR Part 63, Subpart CC, the permit holder shall comply with the following requirements (Title 30 TAC Chapter 113, Subchapter C, § 113.340 incorporated by reference):
 - A. Title 40 CFR § 63.640(l)(3) - (4) (relating to Applicability and Designation of Affected Source), for units and equipment added to an existing source
 - B. Title 40 CFR § 63.640(m)(1) - (2) (relating to Applicability and Designation of Affected Source), for units and emission points changing from Group 2 to Group 1 status

- C. Title 40 CFR § 63.642(c) (relating to General Standards), for applicability of the General Provisions of Subpart A
 - D. Title 40 CFR § 63.642(e) (relating to General Standards), for recordkeeping
 - E. Title 40 CFR § 63.642(f) (relating to General Standards), for reporting
13. For site remediation projects subject to 40 CFR Part 63, Subpart GGGGG that will remove remediation material containing less than 1 megagram per year of the HAP listed in Table 1 to Subpart GGGGG, the permit holder shall comply with 40 CFR § 63.7881(c)(1) - (3) (Title 30 TAC Chapter 113, Subchapter C, § 113.1160 incorporated by reference).

Additional Monitoring Requirements

14. The permit holder shall comply with the periodic monitoring requirements as specified in the attached "Periodic Monitoring Summary" upon issuance of the permit. Except for, as applicable, monitoring malfunctions, associated repairs, and required quality assurance or control activities (including, as applicable, calibration checks and required zero and span adjustments), the permit holder shall conduct all monitoring in continuous operation (or shall collect data at all required intervals) at all times that the pollutant-specific emissions unit is operating. The permit holder may elect to collect monitoring data on a more frequent basis and average the data, consistent with the averaging time specified in the "Periodic Monitoring Summary," for purposes of determining whether a deviation has occurred. However, the additional data points must be collected on a regular basis. In no event shall data be collected and used in particular instances to avoid reporting deviations. Deviations shall be reported according to 30 TAC § 122.145 (Reporting Terms and Conditions).

New Source Review Authorization Requirements

15. Permit holder shall comply with the requirements of New Source Review authorizations issued or claimed by the permit holder for the permitted area, including permits, permits by rule, standard permits, flexible permits, special permits, permits for existing facilities including Voluntary Emissions Reduction Permits and Electric Generating Facility Permits issued under 30 TAC Chapter 116, Subchapter I, or special exemptions referenced in the New Source Review Authorization References attachment. These requirements:
- A. Are incorporated by reference into this permit as applicable requirements
 - B. Shall be located with this operating permit
 - C. Are not eligible for a permit shield
16. The permit holder shall comply with the general requirements of 30 TAC Chapter 106, Subchapter A or the general requirements, if any, in effect at the time of the claim of any PBR.
17. The permit holder shall maintain records to demonstrate compliance with any emission limitation or standard that is specified in a permit by rule (PBR) or Standard Permit listed in the New Source Review Authorizations attachment. The records shall yield reliable data from the relevant time period that are representative of the emission unit's compliance with the PBR or Standard Permit. These records may include, but are not

limited to, production capacity and throughput, hours of operation, safety data sheets (SDS), chemical composition of raw materials, speciation of air contaminant data, engineering calculations, maintenance records, fugitive data, performance tests, capture/control device efficiencies, direct pollutant monitoring (CEMS, COMS, or PEMS), or control device parametric monitoring. These records shall be made readily accessible and available as required by 30 TAC § 122.144. Any monitoring or recordkeeping data indicating noncompliance with the PBR or Standard Permit shall be considered and reported as a deviation according to 30 TAC § 122.145 (Reporting Terms and Conditions).

Compliance Requirements

18. The permit holder shall certify compliance in accordance with 30 TAC § 122.146. The permit holder shall comply with 30 TAC § 122.146 using at a minimum, but not limited to, the continuous or intermittent compliance method data from monitoring, recordkeeping, reporting, or testing required by the permit and any other credible evidence or information. The certification period may not exceed 12 months and the certification must be submitted within 30 days after the end of the period being certified.
19. Use of Discrete Emission Credits to comply with the applicable requirements:
 - A. Unless otherwise prohibited, the permit holder may use discrete emission credits to comply with the following applicable requirements listed elsewhere in this permit:
 - (i) Title 30 TAC Chapter 115
 - (ii) Title 30 TAC Chapter 117
 - (iii) If applicable, offsets for Title 30 TAC Chapter 116
 - (iv) Temporarily exceed state NSR permit allowables
 - B. The permit holder shall comply with the following requirements in order to use the credit to comply with the applicable requirements:
 - (i) The permit holder must notify the TCEQ according to 30 TAC § 101.376(d)
 - (ii) The discrete emission credits to be used must meet all the geographic, timeliness, applicable pollutant type, and availability requirements listed in 30 TAC Chapter 101, Subchapter H, Division 4
 - (iii) The executive director has approved the use of the discrete emission credits according to 30 TAC § 101.376(d)(1)(A)
 - (iv) The permit holder keeps records of the use of credits towards compliance with the applicable requirements in accordance with 30 TAC § 101.372(h) and 30 TAC Chapter 122
 - (v) Title 30 TAC § 101.375 (relating to Emission Reductions Achieved Outside the United States)

Permit Location

20. The permit holder shall maintain a copy of this permit and records related to requirements listed in this permit on site.

Permit Shield (30 TAC § 122.148)

21. A permit shield is granted for the emission units, groups, or processes specified in the attached "Permit Shield." Compliance with the conditions of the permit shall be deemed compliance with the specified potentially applicable requirements or specified potentially applicable state-only requirements listed in the attachment "Permit Shield." Permit shield provisions shall not be modified by the executive director until notification is provided to the permit holder. No later than 90 days after notification of a change in a determination made by the executive director, the permit holder shall apply for the appropriate permit revision to reflect the new determination. Provisional terms are not eligible for this permit shield. Any term or condition, under a permit shield, shall not be protected by the permit shield if it is replaced by a provisional term or condition or the basis of the term and condition changes.

Attachments

Applicable Requirements Summary

Additional Monitoring Requirements

Permit Shield

New Source Review Authorization References

Applicable Requirements Summary

Unit Summary..... 13

Applicable Requirements Summary 19

Note: A “none” entry may be noted for some emission sources in this permit’s “Applicable Requirements Summary” under the heading of “Monitoring and Testing Requirements” and/or “Recordkeeping Requirements” and/or “Reporting Requirements.” Such a notation indicates that there are no requirements for the indicated emission source as identified under the respective column heading(s) for the stated portion of the regulation when the emission source is operating under the conditions of the specified SOP Index Number. However, other relevant requirements pursuant to 30 TAC Chapter 122 including Recordkeeping Terms and Conditions (30 TAC § 122.144), Reporting Terms and Conditions (30 TAC § 122.145), and Compliance Certification Terms and Conditions (30 TAC § 122.146) continue to apply.

Unit Summary

Unit/Group/ Process ID No.	Unit Type	Group/Inclusive Units	SOP Index No.	Regulation	Requirement Driver
DESALTER	VOLATILE ORGANIC COMPOUND WATER SEPARATORS	N/A	R5131-01	30 TAC Chapter 115, Water Separation	No changing attributes.
DESALTER	VOLATILE ORGANIC COMPOUND WATER SEPARATORS	N/A	60QQQ-01	40 CFR Part 60, Subpart QQQ	No changing attributes.
EMGEN1	SRIC ENGINES	N/A	60III-02	40 CFR Part 60, Subpart III	No changing attributes.
EMGEN1	SRIC ENGINES	N/A	63ZZZZ-01	40 CFR Part 63, Subpart ZZZZ	No changing attributes.
EMGEN2	SRIC ENGINES	N/A	60III-03	40 CFR Part 60, Subpart III	No changing attributes.
EMGEN2	SRIC ENGINES	N/A	63ZZZZ-02	40 CFR Part 63, Subpart ZZZZ	No changing attributes.
F260TK1	STORAGE TANKS/VESSELS	N/A	63EEEE-01	40 CFR Part 63, Subpart EEEE	No changing attributes.
F260TK2	STORAGE TANKS/VESSELS	N/A	63EEEE-02	40 CFR Part 63, Subpart EEEE	No changing attributes.
FL-1	FLARES	N/A	R1111-01	30 TAC Chapter 111, Visible Emissions	No changing attributes.
FL-1	FLARES	N/A	60A-01	40 CFR Part 60, Subpart A	No changing attributes.
FL-1	FCCU CAT REGEN/FUEL GAS COMBUSTION/CLAUS SRU	N/A	60Ja-03	40 CFR Part 60, Subpart Ja	No changing attributes.
FUG-1	FUGITIVE EMISSION UNITS	N/A	R5322-ALL	30 TAC Chapter 115, Fugitives Pet Ref B Counties	No changing attributes.

Unit Summary

Unit/Group/ Process ID No.	Unit Type	Group/Inclusive Units	SOP Index No.	Regulation	Requirement Driver
FUG-1	FUGITIVE EMISSION UNITS	N/A	60GGGa-ALL	40 CFR Part 60, Subpart GGGa	No changing attributes.
GRP-DOCK	LOADING/UNLOADING OPERATIONS	LD-11, LD-3, LD-4, LD-7	63CC-01	40 CFR Part 63, Subpart CC	No changing attributes.
GRP-DOCK	LOADING/UNLOADING OPERATIONS	LD-11, LD-3, LD-4, LD-7	63Y-04	40 CFR Part 63, Subpart Y	No changing attributes.
GRP-FHTR	FCCU CAT REGEN/FUEL GAS COMBUSTION/CLAUS SRU	H-1A, H-2A	60Ja-01	40 CFR Part 60, Subpart Ja	No changing attributes.
GRP-FHTR	PROCESS HEATERS/FURNACES	H-1A, H-2A	63DDDDD-01	40 CFR Part 63, Subpart DDDDD	No changing attributes.
GRP-FWP	SRIC ENGINES	FWP1, FWP2	60III-01	40 CFR Part 60, Subpart III	No changing attributes.
GRP-FWP	SRIC ENGINES	FWP1, FWP2	63ZZZZ-01	40 CFR Part 63, Subpart ZZZZ	No changing attributes.
GRP-HOHTR	BOILERS/STEAM GENERATORS/STEAM GENERATING UNITS	H-1B, H-2B	60Db-01	40 CFR Part 60, Subpart Db	No changing attributes.
GRP-HOHTR	FCCU CAT REGEN/FUEL GAS COMBUSTION/CLAUS SRU	H-1B, H-2B	60Ja-02	40 CFR Part 60, Subpart Ja	No changing attributes.
GRP-HOHTR	PROCESS HEATERS/FURNACES	H-1B, H-2B	63DDDDD-02	40 CFR Part 63, Subpart DDDDD	No changing attributes.
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154,	R5112-01	30 TAC Chapter 115, Storage of VOCs	Storage Capacity = Capacity is greater than 40,000 gallons, Product Stored = VOC other than crude oil or condensate

Unit Summary

Unit/Group/ Process ID No.	Unit Type	Group/Inclusive Units	SOP Index No.	Regulation	Requirement Driver
		T155, T156, T157, T158, T159, T160, T161			
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	R5112-02	30 TAC Chapter 115, Storage of VOCs	Storage Capacity = Capacity is greater than 40,000 gallons, Product Stored = Crude oil and/or condensate
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	60Kb-01	40 CFR Part 60, Subpart Kb	Product Stored = Petroleum liquid (other than petroleum or condensate), Maximum True Vapor Pressure = True vapor pressure is greater than or equal to 0.5 psia but less than 0.75 psia
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	60Kb-02	40 CFR Part 60, Subpart Kb	Product Stored = Petroleum liquid (other than petroleum or condensate), Maximum True Vapor Pressure = True vapor pressure is greater than or equal to 0.75 psia but less than 11.1 psia
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	60Kb-03	40 CFR Part 60, Subpart Kb	Product Stored = Petroleum (other than crude oil) or condensate stored, processed, and/or treated after custody transfer, Maximum True Vapor Pressure = True vapor pressure is greater than or equal to 0.75

Unit Summary

Unit/Group/ Process ID No.	Unit Type	Group/Inclusive Units	SOP Index No.	Regulation	Requirement Driver
					psia but less than 11.1 psia
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	60Kb-04	40 CFR Part 60, Subpart Kb	Product Stored = Crude oil stored, processed, and/or treated after custody transfer, Maximum True Vapor Pressure = True vapor pressure is greater than or equal to 0.75 psia but less than 11.1 psia, Reid Vapor Pressure = Reid vapor pressure is less than 2.0 psia
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	60Kb-05	40 CFR Part 60, Subpart Kb	Product Stored = Crude oil stored, processed, and/or treated after custody transfer, Maximum True Vapor Pressure = True vapor pressure is greater than or equal to 0.75 psia but less than 11.1 psia, Reid Vapor Pressure = Reid vapor pressure is greater than or equal to 2.0 psia
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	63CC-01	40 CFR Part 63, Subpart CC	Group 1 Storage Vessel = The storage vessel is a Group 1 storage vessel (as defined in 40 CFR § 63.641), Existing Source = The storage vessel is at a new source., True Vapor Pressure = Maximum true vapor pressure of the total organic HAPs in the liquid is less than 11.11 psi (76.6 kPa), Emission Control Type = Fixed roof and an internal floating roof, Seal Type =

Unit Summary

Unit/Group/ Process ID No.	Unit Type	Group/Inclusive Units	SOP Index No.	Regulation	Requirement Driver
					Metallic shoe seal (as defined in 40 CFR § 63.111)
GRP-TK1	STORAGE TANKS/VESSELS	T120, T121, T122, T123, T124, T125, T135, T136, T137, T138, T139, T154, T155, T156, T157, T158, T159, T160, T161	63CC-02	40 CFR Part 63, Subpart CC	Group 1 Storage Vessel = The storage vessel is a Group 2 vessel, Applicability = The storage vessel is required to comply with 40 CFR Part 63, Subpart CC and is part of a process unit.
GRP-TK2	STORAGE TANKS/VESSELS	T126, T127, T128, T129	63CC-02	40 CFR Part 63, Subpart CC	No changing attributes.
GRP-TKHTR	BOILERS/STEAM GENERATORS/STEAM GENERATING UNITS	H-3, H-4	60Dc-01	40 CFR Part 60, Subpart Dc	No changing attributes.
GRP-TKHTR	PROCESS HEATERS/FURNACES	H-3, H-4	63DDDDDD-03	40 CFR Part 63, Subpart DDDDDD	No changing attributes.
GRP-VCU	EMISSION POINTS/STATIONARY VENTS/PROCESS VENTS	VCU1, VCU2	R1111-01	30 TAC Chapter 111, Visible Emissions	No changing attributes.
I865TK1	STORAGE TANKS/VESSELS	N/A	R5112-03	30 TAC Chapter 115, Storage of VOCs	No changing attributes.
I865TK1	STORAGE TANKS/VESSELS	N/A	63EEEE-02	40 CFR Part 63, Subpart EEEE	No changing attributes.
I865TK2	STORAGE TANKS/VESSELS	N/A	R5112-03	30 TAC Chapter 115, Storage of VOCs	No changing attributes.
I865TK2	STORAGE TANKS/VESSELS	N/A	63EEEE-02	40 CFR Part 63, Subpart EEEE	No changing attributes.

Unit Summary

Unit/Group/ Process ID No.	Unit Type	Group/Inclusive Units	SOP Index No.	Regulation	Requirement Driver
MSSVCU	EMISSION POINTS/STATIONARY VENTS/PROCESS VENTS	N/A	R1111-01	30 TAC Chapter 111, Visible Emissions	No changing attributes.
MSSVCU	FCCU CAT REGEN/FUEL GAS COMBUSTION/CLAUS SRU	N/A	60Ja-04	40 CFR Part 60, Subpart Ja	No changing attributes.
PARTK1	STORAGE TANKS/VESSELS	N/A	R5112-03	30 TAC Chapter 115, Storage of VOCs	No changing attributes.
PARTK1	STORAGE TANKS/VESSELS	N/A	63EEEE-02	40 CFR Part 63, Subpart EEEE	No changing attributes.
PTRUCK	LOADING/UNLOADING OPERATIONS	N/A	R5211-02	30 TAC Chapter 115, Loading and Unloading of VOC	No changing attributes.
SAMPTK	STORAGE TANKS/VESSELS	N/A	63EEEE-01	40 CFR Part 63, Subpart EEEE	No changing attributes.
VC-2001	EMISSION POINTS/STATIONARY VENTS/PROCESS VENTS	N/A	R5121-01	30 TAC Chapter 115, Vent Gas Controls	No changing attributes.
VC-2001	EMISSION POINTS/STATIONARY VENTS/PROCESS VENTS	N/A	63CC-01	40 CFR Part 63, Subpart CC	No changing attributes.

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
DESALTER	EU	R5131-01	VOC	30 TAC Chapter 115, Water Separation	§ 115.132(b)(3) § 115.131(b)	VOC water separator compartments must be equipped with a vapor recovery system which satisfies the provisions of §115.131(b) of this title.	[G]§ 115.135(b) § 115.136(b)(3) § 115.136(b)(4) ** See Periodic Monitoring Summary	§ 115.136(b)(3) § 115.136(b)(4)	None
DESALTER	EU	60QQQ-01	VOC	40 CFR Part 60, Subpart QQQ	§ 60.692-3(a) § 60.692-1(a) § 60.692-3(a)(1) § 60.692-3(a)(2) § 60.692-3(a)(3) § 60.692-3(a)(5) § 60.692-3(b) § 60.692-3(e) § 60.692-5(c) § 60.692-5(d) [G]§ 60.692-5(e) § 60.692-6(a) § 60.692-6(b) § 60.692-7(b)	Except as noted, each oil-water separator tank, slop oil tank, storage vessel, or other auxiliary equipment shall be equipped with fixed roof, meeting following specifications:	§ 60.692-3(a)(4) § 60.695(a)(4) § 60.696(a) § 60.696(c)	§ 60.697(a) § 60.697(c) § 60.697(d) [G]§ 60.697(e) § 60.697(f)(1) [G]§ 60.697(f)(2) § 60.697(f)(3) § 60.697(f)(3)(i) § 60.697(f)(3)(iii) § 60.697(f)(3)(iv) § 60.697(f)(3)(v) § 60.697(f)(3)(vi) § 60.697(f)(3)(vii)	§ 60.698(b)(1) § 60.698(b)(2) § 60.698(e)
EMGEN1	EU	60III-02	CO	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.112(a)	Owners and operators of emergency stationary CI ICE, that are not fire pump engines, with a maximum engine power greater than or equal to 130 KW and less than or equal to 2237 KW and a displacement of less than 10 liters per cylinder and is a 2007 model year and later must comply with a	§ 60.4209(a)	§ 60.4214(b)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						CO emission limit of 3.5 g/KW-hr, as stated in 40 CFR 60.4202(a)(2) and 40 CFR 89.112(a).			
EMGEN1	EU	60III-02	NMHC and NO _x	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.112(a)	Owners and operators of emergency stationary CI ICE, that are not fire pump engines, with a maximum engine power greater than or equal to 75 KW and less than or equal to 560 KW and a displacement of less than 10 liters per cylinder and is a 2007 model year and later must comply with an NMHC+NOx emission limit of 4.0 g/KW-hr, as stated in 40 CFR 60.4202(a)(2) and 40 CFR 89.112(a).	§ 60.4209(a)	§ 60.4214(b)	None
EMGEN1	EU	60III-02	PM (OPACITY)	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.113(a)(1) § 89.113(a)(2) § 89.113(a)(3)	Emergency stationary CI ICE, that are not fire pump engines, with displacement < 10 lpc and not constant-speed engines, with max engine power < 2237 KW and a 2007 model year and later or max engine power > 2237 KW and a 2011 model	§ 60.4209(a)	§ 60.4214(b)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						year and later, must comply with following opacity emission limits: 20% during acceleration, 15% during lugging, 50% during peaks in either acceleration or lugging modes as stated in §60.4202(a)(1)-(2), (b)(2) and §89.113(a)(1)-(3) and §1039.105(b)(1)-(3).			
EMGEN1	EU	60III-02	PM	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.112(a)	Owners and operators of emergency stationary CI ICE, that are not fire pump engines, with a maximum engine power greater than or equal to 130 KW and less than or equal to 2237 KW and a displacement of less than 10 liters per cylinder and is a 2007 model year and later must comply with a PM emission limit of 0.20 g/KW-hr, as stated in 40 CFR 60.4202(a)(2) and 40 CFR 89.112(a).	§ 60.4209(a)	§ 60.4214(b)	None
EMGEN1	EU	63ZZZZ-01	EXEMPT	40 CFR Part 63, Subpart ZZZZ	§ 63.6590(b)(1) § 63.6595(c) § 63.6640(f)(1)	An affected source which meets either of the criteria in	None	None	§ 63.6645(c) § 63.6645(f)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
					[G]§ 63.6640(f)(2) § 63.6640(f)(3)	paragraphs §63.6590(b)(1)(i)-(ii) of this section does not have to meet the requirements of this subpart and of subpart A of this part except for the initial notification requirements of §63.6645(f).			
EMGEN2	EU	60III-03	CO	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.112(a)	Owners and operators of emergency stationary CI ICE, that are not fire pump engines, with a maximum engine power greater than or equal to 37 KW and less than 130 KW and a displacement of less than 10 liters per cylinder and is a 2007 model year and later must comply with a CO emission limit of 5.0 g/KW-hr, as stated in 40 CFR 60.4202(a)(2) and 40 CFR 89.112(a).	§ 60.4209(a)	§ 60.4214(b)	None
EMGEN2	EU	60III-03	NMHC and NO _x	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f)	Owners and operators of emergency stationary CI ICE, that are not fire pump engines, with a maximum engine power greater than or	§ 60.4209(a)	§ 60.4214(b)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
					§ 60.4218 § 89.112(a)	equal to 75 KW and less than or equal to 560 KW and a displacement of less than 10 liters per cylinder and is a 2007 model year and later must comply with an NMHC+NOx emission limit of 4.0 g/KW-hr, as stated in 40 CFR 60.4202(a)(2) and 40 CFR 89.112(a).			
EMGEN2	EU	60III-03	PM (OPACITY)	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.113(a)(1) § 89.113(a)(2) § 89.113(a)(3)	Emergency stationary CI ICE, that are not fire pump engines, with displacement < 10 lpc and not constant-speed engines, with max engine power < 2237 KW and a 2007 model year and later or max engine power > 2237 KW and a 2011 model year and later, must comply with following opacity emission limits: 20% during acceleration, 15% during lugging, 50% during peaks in either acceleration or lugging modes as stated in §60.4202(a)(1)-(2), (b)(2) and	§ 60.4209(a)	§ 60.4214(b)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						§89.113(a)(1)-(3) and §1039.105(b)(1)-(3).			
EMGEN2	EU	60III-03	PM	40 CFR Part 60, Subpart III	§ 60.4205(b) § 60.4202(a)(2) § 60.4206 [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218 § 89.112(a)	Owners and operators of emergency stationary CI ICE, that are not fire pump engines, with a maximum engine power greater than or equal to 75 KW and less than 130 KW and a displacement of less than 10 liters per cylinder and is a 2007 model year and later must comply with a PM emission limit of 0.30 g/KW-hr, as stated in 40 CFR 60.4202(a)(2) and 40 CFR 89.112(a).	§ 60.4209(a)	§ 60.4214(b)	None
EMGEN2	EU	63ZZZ-02	112(B) HAPS	40 CFR Part 63, Subpart ZZZZ	§ 63.6590(c)	Stationary RICE subject to Regulations under 40 CFR Part 60. An affected source that meets any of the criteria in paragraphs (c)(1) through (7) of this section must meet the requirements of this part by meeting the requirements of 40 CFR part 60 subpart III, for compression ignition engines or 40 CFR part 60 subpart	None	None	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						JJJJ, for spark ignition engines as applicable. No further requirements apply for such engines under this part.			
F260TK1	EU	63EEEE-01	112(B) HAPS	40 CFR Part 63, Subpart EEEE	§ 63.2350 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart EEEE
F260TK2	EU	63EEEE-02	112(B) HAPS	40 CFR Part 63, Subpart EEEE	§ 63.2350 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart EEEE
FL-1	EU	R1111-01	PM (OPACITY)	30 TAC Chapter 111, Visible Emissions	§ 111.111(a)(4)(A)	Visible emissions from a process gas flare shall not be permitted for more than five minutes in any two-hour period, except for upset emissions as provided in §101.11(a).	§ 111.111(a)(4)(A)(i) § 111.111(a)(4)(A)(ii)	§ 111.111(a)(4)(A)(ii)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
FL-1	CD	60A-01	OPACITY	40 CFR Part 60, Subpart A	§ 60.18(b) § 60.18(c)(1) § 60.18(c)(2) § 60.18(c)(3)(ii) § 60.18(c)(5) § 60.18(c)(6) § 60.18(e)	Flares shall comply with paragraphs (c)-(f) of § 60.18.	§ 60.18(d) § 60.18(f)(1) § 60.18(f)(2) § 60.18(f)(3) § 60.18(f)(6)	None	None
FL-1	EU	60Ja-03	PM, SO ₂ , NO _x , CO	40 CFR Part 60, Subpart Ja	§ 60.100a(a) The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 60, Subpart Ja
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.327(1)	Valves of nominal size of 2" (5 cm) or less are exempt, provided allowable emissions from sources affected by this division after controls are applied with exemptions will not exceed by more than 5.0% such allowable emissions with no exemptions.	None	None	§ 115.327(1)(A) § 115.327(1)(B) § 115.327(1)(C)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.327(3)	No pump seal, as described in § 115.327(3) or (5), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						the leak is found, except as provided in §115.322(2).			
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3)	No pump seal may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	§ 115.324 § 115.324(1) § 115.324(1)(A) § 115.324(3) § 115.324(4) § 115.324(6) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(4) § 115.327(5)	No valve (gaseous service), as described in § 115.327(3) or (5), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(4) § 115.322(5)	No valve (gaseous service) may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	§ 115.324 § 115.324(2) § 115.324(2)(B) § 115.324(4) § 115.324(6) [G]§ 115.324(7) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.324(7) [G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(4)	No valve in liquid service, as described in § 115.327(3) or (5), may be allowed to	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
					§ 115.327(3) § 115.327(5)	have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).			
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(4)	No valve in liquid service may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	§ 115.324 § 115.324(1) § 115.324(1)(B) § 115.324(4) § 115.324(6) [G]§ 115.324(7) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.324(7) [G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.327(3)	No process drain, as described in § 115.327(3) or (5), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3)	No process drain may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	§ 115.324 § 115.324(1) § 115.324(1)(C) § 115.324(4) § 115.324(6) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-	VOC	30 TAC	§ 115.322(1)	No compressor seal,	[G]§ 115.325	[G]§ 115.326(1)	[G]§ 115.326(1)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
		ALL		Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(2) § 115.322(3) § 115.327(3) § 115.327(6)	as described in § 115.327(3), (5) or (6), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).		§ 115.326(5)	§ 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3)	No compressor seal may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	§ 115.324 § 115.324(2) § 115.324(2)(A) § 115.324(4) § 115.324(6) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(4) § 115.327(3) § 115.327(5)	No elevated valve, as described in § 115.327(3) or (5), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(4)	No elevated valve may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in	§ 115.324 § 115.324(1) § 115.324(1)(D) § 115.324(4) § 115.324(6) [G]§ 115.324(7) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.324(7) [G]§ 115.326(1) § 115.327(4)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						§115.322(2).			
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.327(5)	No pressure relief valve in gaseous service, as described in § 115.327(3) or (5), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.322(5)	No pressure relief valve in gaseous service may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	§ 115.324 § 115.324(2) § 115.324(2)(C) § 115.324(4) § 115.324(5) § 115.324(6) [G]§ 115.324(7) [G]§ 115.325	[G]§ 115.326(1) [G]§ 115.326(2) [G]§ 115.326(3) § 115.326(5)	[G]§ 115.324(7) [G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115, Fugitives Pet Ref B Counties	§ 115.322(1) § 115.322(2) § 115.322(3) § 115.327(3)	No connector, as described in § 115.327(3) or (5), may be allowed to have a VOC leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	[G]§ 115.325	[G]§ 115.326(1) § 115.326(5)	[G]§ 115.326(1) § 115.327(4)
FUG-1	EU	R5322-ALL	VOC	30 TAC Chapter 115,	§ 115.322(1) § 115.322(2) § 115.322(3)	No connector may be allowed to have a VOC	§ 115.324(4) § 115.324(6)	[G]§ 115.326(1) [G]§ 115.326(2)	[G]§ 115.326(1) § 115.327(4)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
				Fugitives Pet Ref B Counties	§ 115.322(3)	leak as defined in §101.1 for more than 15 calendar days after the leak is found, except as provided in §115.322(2).	[G]§ 115.325	[G]§ 115.326(3) § 115.326(5)	
FUG-1	EU	60GGGa-ALL	VOC	40 CFR Part 60, Subpart GGGa	[G]§ 60.590a(a) The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 60, Subpart GGGa	The permit holder shall comply with the applicable requirements of 40 CFR Part 60, Subpart GGGa	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 60, Subpart GGGa	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 60, Subpart GGGa	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 60, Subpart GGGa
GRP-DOCK	EU	63CC-01	112(B) HAPS	40 CFR Part 63, Subpart CC	§ 63.651(a)	Except as provided in §63.651(b)-(d), each owner or operator of a marine tank vessel loading operation located at a petroleum refinery shall comply with the requirements of §63.560 through §63.567.	§ 63.642(d)(1) § 63.642(d)(3) § 63.642(d)(4)	§ 63.642(e) § 63.655(c) § 63.655(i)(6)	§ 63.642(d)(2) § 63.642(f) § 63.655(c)
GRP-DOCK	EU	63Y-04	EXEMPT	40 CFR Part 63, Subpart Y	§ 63.560(a)(2) § 153.282 § 63.560(a)(4)	Existing sources with emissions less than 10 and 25 tons must meet the submerged fill standards of 46 CFR 153.282. This submerged fill requirement does not apply to petroleum refineries.	§ 63.565(l)	§ 63.567(j)(4)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
GRP-FHTR	EU	60Ja-01	PM, SO ₂ , NO _x , CO	40 CFR Part 60, Subpart Ja	§ 60.100a(a) The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 60, Subpart Ja
GRP-FHTR	EU	63DDDD D-01	112(B) HAPS	40 CFR Part 63, Subpart DDDDD	§ 63.7505 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart DDDDD
GRP-FWP	EU	60III-01	NMHC and NO _x	40 CFR Part 60, Subpart III	§ 60.4205(c)-Table 4 § 60.4206 § 60.4207(b) [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218	Owners and operators of emergency stationary fire pump CI ICE with a maximum engine power greater than or equal to 130 KW and less than or equal to 560 KW and a displacement of less than 30 liters per cylinder and is a 2009 model year and later must comply with an NMHC+NO _x emission limit of 4.0 g/KW-hr, as listed in Table 4 to	§ 60.4209(a)	§ 60.4214(b)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						this subpart.			
GRP-FWP	EU	60III-01	PM	40 CFR Part 60, Subpart III	§ 60.4205(c)-Table 4 § 60.4206 [G]§ 60.4211(a) § 60.4211(c) [G]§ 60.4211(f) § 60.4218	Owners and operators of emergency stationary fire pump CI ICE with a maximum engine power greater than or equal to 130 KW and less than or equal to 560 KW and a displacement of less than 30 liters per cylinder and is a 2009 model year and later must comply with a PM emission limit of 0.20 g/KW-hr, as listed in Table 4 to this subpart.	§ 60.4209(a)	§ 60.4214(b)	None
GRP-FWP	EU	63ZZZ-01	EXEMPT	40 CFR Part 63, Subpart ZZZZ	§ 63.6590(b)(1) § 63.6595(c) § 63.6640(f)(1) [G]§ 63.6640(f)(2) § 63.6640(f)(3)	An affected source which meets either of the criteria in paragraphs §63.6590(b)(1)(i)-(ii) of this section does not have to meet the requirements of this subpart and of subpart A of this part except for the initial notification requirements of §63.6645(f).	None	None	§ 63.6645(c) § 63.6645(f)
GRP-HOHTR	EU	60Db-01	PM	40 CFR Part 60, Subpart Db	§ 60.40b(a)	This subpart applies to each steam generating unit	None	[G]§ 60.49b(d) § 60.49b(o)	§ 60.49b(a) § 60.49b(a)(1) § 60.49b(a)(3)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						constructed, modified, or reconstructed after 6/19/84, and that has a heat input capacity from fuels combusted in the unit > 29 MW (100 MMBtu/hr).			
GRP-HOHTR	EU	60Db-01	PM (OPACITY)	40 CFR Part 60, Subpart Db	§ 60.40b(a)	This subpart applies to each steam generating unit constructed, modified, or reconstructed after 6/19/84, and that has a heat input capacity from fuels combusted in the unit > 29 MW (100 MMBtu/hr).	None	[G]§ 60.49b(d) § 60.49b(o)	§ 60.49b(a) § 60.49b(a)(1) § 60.49b(a)(3)
GRP-HOHTR	EU	60Db-01	NO _x	40 CFR Part 60, Subpart Db	§ 60.44b(l)(1) § 60.44b(h) § 60.44b(i) § 60.46b(a)	Affected facilities combusting coal, oil, or natural gas, or a mixture of these fuels, or any other fuels: a limit of 86 ng/JI (0.20 lb/million Btu) heat input unless the affected facility meets the specified requirements.	§ 60.46b(c) § 60.46b(e) § 60.46b(e)(1) § 60.46b(e)(4) [G]§ 60.48b(b) § 60.48b(c) § 60.48b(d) § 60.48b(e) [G]§ 60.48b(e)(2) § 60.48b(e)(3) § 60.48b(f) § 60.48b(g)(1)	[G]§ 60.48b(b) § 60.48b(c) [G]§ 60.49b(d) [G]§ 60.49b(g) § 60.49b(o)	§ 60.49b(a) § 60.49b(a)(1) § 60.49b(a)(3) § 60.49b(b) § 60.49b(h) § 60.49b(h)(4) § 60.49b(i) § 60.49b(v) § 60.49b(w)
GRP-HOHTR	EU	60Ja-02	PM, SO ₂ , NO _x , CO	40 CFR Part 60, Subpart Ja	§ 60.100a(a) The permit holder shall comply with the applicable limitation, standard and/or equipment specification	The permit holder shall comply with the applicable requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 60, Subpart Ja

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Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
					requirements of 40 CFR Part 60, Subpart Ja				
GRP-HOHTR	EU	63DDDD D-02	112(B) HAPS	40 CFR Part 63, Subpart DDDDD	§ 63.7505 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart DDDDD
GRP-TK1	EU	R5112-01	VOC	30 TAC Chapter 115, Storage of VOCs	§ 115.112(b)(1) § 115.112(b)(2) § 115.112(b)(2)(A) § 115.112(b)(2)(B) § 115.112(b)(2)(C) § 115.112(b)(2)(D) § 115.112(b)(2)(E) § 115.114(b)(1)(A)	Tanks shall not store VOC unless the required pressure is maintained, or they are equipped with the appropriate control device specified in Table I(a) or Table II(a).	§ 115.114(b)(1)(A) [G]§ 115.117 ** See Periodic Monitoring Summary	§ 115.118(b)(2) § 115.118(b)(4) § 115.118(b)(5)	§ 115.114(b)(1)(B)
GRP-TK1	EU	R5112-02	VOC	30 TAC Chapter 115, Storage of VOCs	§ 115.112(b)(1) § 115.112(b)(2) § 115.112(b)(2)(A) § 115.112(b)(2)(B) § 115.112(b)(2)(C) § 115.112(b)(2)(D) § 115.112(b)(2)(E) § 115.114(b)(1)(A)	Tanks shall not store VOC unless the required pressure is maintained, or they are equipped with the appropriate control device specified in Table I(a) or Table II(a).	§ 115.114(b)(1)(A) [G]§ 115.117 ** See Periodic Monitoring Summary	§ 115.118(b)(2) § 115.118(b)(4) § 115.118(b)(5)	§ 115.114(b)(1)(B)
GRP-TK1	EU	60Kb-01	VOC	40 CFR Part 60, Subpart Kb	§ 60.110b(a)	Except for §60.110b(b), this subpart applies to vessels with a capacity	§ 60.116b(a) § 60.116b(b) § 60.116b(c) § 60.116b(d)	§ 60.116b(a) § 60.116b(b) § 60.116b(c)	§ 60.116b(d)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						greater than or equal to 75 cubic meters (19,800 gal) used to store VOLs for which construction/reconstruction/modification began after 7/23/84.	§ 60.116b(e) § 60.116b(e)(1) § 60.116b(e)(2)(i)		
GRP-TK1	EU	60Kb-02	VOC	40 CFR Part 60, Subpart Kb	§ 60.112b(a)(1) § 60.112b(a)(1)(i) § 60.112b(a)(1)(ii)(C) § 60.112b(a)(1)(iii) § 60.112b(a)(1)(iv) § 60.112b(a)(1)(ix) § 60.112b(a)(1)(v) § 60.112b(a)(1)(vi) § 60.112b(a)(1)(vii) § 60.112b(a)(1)(viii)	Storage vessels specified in §60.112b(a) and equipped with a fixed roof in combination with an internal floating roof shall meet the specifications listed in §60.112b(a)(1)(i)-(ix).	§ 60.113b(a)(1) § 60.113b(a)(2) § 60.113b(a)(4) § 60.113b(a)(5) § 60.116b(a) § 60.116b(b) § 60.116b(c) § 60.116b(e) § 60.116b(e)(1) § 60.116b(e)(2)(i)	§ 60.115b § 60.115b(a)(2) § 60.116b(a) § 60.116b(b) § 60.116b(c)	§ 60.113b(a)(2) § 60.113b(a)(5) § 60.115b § 60.115b(a)(1) § 60.115b(a)(3)
GRP-TK1	EU	60Kb-03	VOC	40 CFR Part 60, Subpart Kb	§ 60.112b(a)(1) § 60.112b(a)(1)(i) § 60.112b(a)(1)(ii)(C) § 60.112b(a)(1)(iii) § 60.112b(a)(1)(iv) § 60.112b(a)(1)(ix) § 60.112b(a)(1)(v) § 60.112b(a)(1)(vi) § 60.112b(a)(1)(vii) § 60.112b(a)(1)(viii)	Storage vessels specified in §60.112b(a) and equipped with a fixed roof in combination with an internal floating roof shall meet the specifications listed in §60.112b(a)(1)(i)-(ix).	§ 60.113b(a)(1) § 60.113b(a)(2) § 60.113b(a)(4) § 60.113b(a)(5) § 60.116b(a) § 60.116b(b) § 60.116b(c) § 60.116b(e) § 60.116b(e)(1) [G]§ 60.116b(e)(3)	§ 60.115b § 60.115b(a)(2) § 60.116b(a) § 60.116b(b) § 60.116b(c)	§ 60.113b(a)(2) § 60.113b(a)(5) § 60.115b § 60.115b(a)(1) § 60.115b(a)(3)
GRP-TK1	EU	60Kb-04	VOC	40 CFR Part 60, Subpart Kb	§ 60.112b(a)(1) § 60.112b(a)(1)(i) § 60.112b(a)(1)(ii)(C) § 60.112b(a)(1)(iii) § 60.112b(a)(1)(iv) § 60.112b(a)(1)(ix) § 60.112b(a)(1)(v) § 60.112b(a)(1)(vi) § 60.112b(a)(1)(vii)	Storage vessels specified in §60.112b(a) and equipped with a fixed roof in combination with an internal floating roof shall meet the specifications listed in	§ 60.113b(a)(1) § 60.113b(a)(2) § 60.113b(a)(4) § 60.113b(a)(5) § 60.116b(a) § 60.116b(b) § 60.116b(c) § 60.116b(e) § 60.116b(e)(2)(ii)	§ 60.115b § 60.115b(a)(2) § 60.116b(a) § 60.116b(b) § 60.116b(c) § 60.116b(e)(2)(ii)	§ 60.113b(a)(2) § 60.113b(a)(5) § 60.115b § 60.115b(a)(1) § 60.115b(a)(3)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
					§ 60.112b(a)(1)(viii)	§60.112b(a)(1)(i)-(ix).			
GRP-TK1	EU	60Kb-05	VOC	40 CFR Part 60, Subpart Kb	§ 60.112b(a)(1) § 60.112b(a)(1)(i) § 60.112b(a)(1)(ii)(C) § 60.112b(a)(1)(iii) § 60.112b(a)(1)(iv) § 60.112b(a)(1)(ix) § 60.112b(a)(1)(v) § 60.112b(a)(1)(vi) § 60.112b(a)(1)(vii) § 60.112b(a)(1)(viii)	Storage vessels specified in §60.112b(a) and equipped with a fixed roof in combination with an internal floating roof shall meet the specifications listed in §60.112b(a)(1)(i)-(ix).	§ 60.113b(a)(1) § 60.113b(a)(2) § 60.113b(a)(4) § 60.113b(a)(5) § 60.116b(a) § 60.116b(b) § 60.116b(c) § 60.116b(c) § 60.116b(e) § 60.116b(e)(1) § 60.116b(e)(2)(i)	§ 60.115b § 60.115b(a)(2) § 60.116b(a) § 60.116b(b) § 60.116b(c)	§ 60.113b(a)(2) § 60.113b(a)(5) § 60.115b § 60.115b(a)(1) § 60.115b(a)(3)
GRP-TK1	EU	63CC-01	112(B) HAPS	40 CFR Part 63, Subpart CC	§ 63.660(a)-(i) § 63.1062(a) § 63.1062(a)(1) § 63.1063(a)(1)(i)(B) [G]§ 63.1063(a)(2) [G]§ 63.1063(b) § 63.642(a) § 63.642(b) § 63.642(c) § 63.642(n) [G]§ 63.660(b) § 63.660(c)	Each owner or operator of a Group 1 storage vessel subject to this subpart shall comply with the requirements in subpart WW of this part according to the requirements in § 63.660(a)-(i).	[G]§ 63.1063(c)(1) § 63.1063(d) [G]§ 63.1063(d)(1) § 63.1063(d)(2) [G]§ 63.1063(e) § 63.660(a)(1) § 63.660(a)(2) § 63.660(e)	§ 63.1065(a) § 63.1065(b) § 63.1065(b)(1)[G] § 63.1065(c) § 63.1065(d) § 63.642(e) § 63.655(i) § 63.655(i)(1) § 63.655(i)(1)(v) § 63.655(i)(6) § 63.660(a)(1)	[G]§ 63.1066 § 63.642(f) § 63.655(e) [G]§ 63.655(f) § 63.655(g) § 63.655(g)(1) § 63.655(g)(14) [G]§ 63.655(g)(2)(ii) § 63.655(h) [G]§ 63.655(h)(2)(i) § 63.655(h)(6)(ii) § 63.660(f) § 63.660(h)
GRP-TK1	EU	63CC-02	112(B) HAPS	40 CFR Part 63, Subpart CC	§ 63.640(a) § 63.640(c)(2)	This subpart applies to petroleum refining process units and related emissions points specified in paragraphs (c)(1)-(9) of this section that are located at a plant site and that meet the criteria in paragraphs (a)(1) and (2) of this section.	None	§ 63.1065(a) § 63.655(i) § 63.655(i)(1)(vi)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
GRP-TK2	EU	63CC-02	112(B) HAPS	40 CFR Part 63, Subpart CC	§ 63.640(a) § 63.640(c)(2)	This subpart applies to petroleum refining process units and related emissions points specified in paragraphs (c)(1)-(9) of this section that are located at a plant site and that meet the criteria in paragraphs (a)(1) and (2) of this section.	None	§ 63.1065(a) § 63.655(i) § 63.655(i)(1)(vi)	None
GRP-TKHTR	EU	60Dc-01	SO ₂	40 CFR Part 60, Subpart Dc	§ 60.40c(a)	This subpart applies to each steam generating unit constructed, reconstructed, or modified after 6/9/89 and that has a maximum design heat input capacity of 2.9-29 megawatts (MW).	None	§ 60.48c(g)(1) § 60.48c(g)(2) § 60.48c(g)(3) § 60.48c(i)	[G]§ 60.48c(a)
GRP-TKHTR	EU	60Dc-01	PM	40 CFR Part 60, Subpart Dc	§ 60.40c(a)	This subpart applies to each steam generating unit constructed, reconstructed, or modified after 6/9/89 and that has a maximum design heat input capacity of 2.9-29 megawatts (MW).	None	§ 60.48c(g)(1) § 60.48c(g)(2) § 60.48c(g)(3) § 60.48c(i)	[G]§ 60.48c(a)
GRP-TKHTR	EU	60Dc-01	PM (OPACITY)	40 CFR Part 60, Subpart Dc	§ 60.40c(a)	This subpart applies to each steam generating unit constructed,	None	§ 60.48c(g)(1) § 60.48c(g)(2) § 60.48c(g)(3) § 60.48c(i)	[G]§ 60.48c(a)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						reconstructed, or modified after 6/9/89 and that has a maximum design heat input capacity of 2.9-29 megawatts (MW).			
GRP-TKHTR	EU	63DDDD D-03	112(B) HAPS	40 CFR Part 63, Subpart DDDDD	§ 63.7505 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart DDDDD	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart DDDDD
GRP-VCU	EP	R1111-01	PM (OPACITY)	30 TAC Chapter 111, Visible Emissions	§ 111.111(a)(1)(C) § 111.111(a)(1)(E)	Visible emissions from any stationary vent shall not exceed an opacity of 15% averaged over a six minute period for any source with a total flow rate of at least 100,000 acfm unless a CEMS is installed.	[G]§ 111.111(a)(1)(F) ** See Periodic Monitoring Summary	None	None
I865TK1	EU	R5112-03	VOC	30 TAC Chapter 115, Storage of VOCs	§ 115.112(b)(1)	Tanks shall not store VOC unless the required pressure is maintained, or they are equipped with the appropriate control device specified in Table I(a) or Table II(a).	[G]§ 115.117 ** See Periodic Monitoring Summary	§ 115.118(b)(4) § 115.118(b)(5)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
I865TK1	EU	63EEEE-02	112(B) HAPS	40 CFR Part 63, Subpart EEEE	§ 63.2350 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart EEEE
I865TK2	EU	R5112-03	VOC	30 TAC Chapter 115, Storage of VOCs	§ 115.112(b)(1)	Tanks shall not store VOC unless the required pressure is maintained, or they are equipped with the appropriate control device specified in Table I(a) or Table II(a).	[G]§ 115.117 ** See Periodic Monitoring Summary	§ 115.118(b)(4) § 115.118(b)(5)	None
I865TK2	EU	63EEEE-02	112(B) HAPS	40 CFR Part 63, Subpart EEEE	§ 63.2350 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart EEEE
MSSVCU	EP	R1111-01	PM (OPACITY)	30 TAC Chapter 111, Visible Emissions	§ 111.111(a)(1)(C) § 111.111(a)(1)(E)	Visible emissions from any stationary vent shall not exceed an opacity of 15% averaged over a six minute period for any source with a total	[G]§ 111.111(a)(1)(F) ** See Periodic Monitoring Summary	None	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						flow rate of at least 100,000 acfm unless a CEMS is installed.			
MSSVCU	EU	60Ja-04	PM, SO ₂ , NO _x , CO	40 CFR Part 60, Subpart Ja	§ 60.100a(a) The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 60, Subpart Ja	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 60, Subpart Ja
PARTK1	EU	R5112-03	VOC	30 TAC Chapter 115, Storage of VOCs	§ 115.112(b)(1)	Tanks shall not store VOC unless the required pressure is maintained, or they are equipped with the appropriate control device specified in Table I(a) or Table II(a).	[G]§ 115.117 ** See Periodic Monitoring Summary	§ 115.118(b)(4) § 115.118(b)(5)	None
PARTK1	EU	63EEEE-02	112(B) HAPS	40 CFR Part 63, Subpart EEEE	§ 63.2350 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart EEEE
PTRUCK	EU	R5211-02	VOC	30 TAC Chapter 115, Loading and	§ 115.217(b)(4) § 115.214(b)(1)(B) § 115.214(b)(1)(D)	Crude oil, condensate, and liquefied petroleum gas. All	§ 115.214(b)(1)(A) § 115.214(b)(1)(A)(i)	§ 115.216 § 115.216(3)(A) § 115.216(3)(A)(ii)	None

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
				Unloading of VOC	§ 115.214(b)(1)(D)(i)	loading and unloading of crude oil, condensate, and liquefied petroleum gas is exempt from division, except for the specified requirements.		§ 115.216(3)(B)	
SAMPTK	EU	63EEEE-01	112(B) HAPS	40 CFR Part 63, Subpart EEEE	§ 63.2350 The permit holder shall comply with the applicable limitation, standard and/or equipment specification requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable monitoring and testing requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable recordkeeping requirements of 40 CFR Part 63, Subpart EEEE	The permit holder shall comply with the applicable reporting requirements of 40 CFR Part 63, Subpart EEEE
VC-2001	EP	R5121-01	VOC	30 TAC Chapter 115, Vent Gas Controls	§ 115.127(b)(2)(A) § 115.127(b)(2)	A vent gas stream having a combined weight of the VOC or classes of compounds specified in §115.121(b)(2) and (3) of this title equal to or less than 100 pounds in any continuous 24-hour period is exempt from the requirements of §115.121(b) of this title.	[G]§ 115.125 § 115.126(2)	§ 115.126 § 115.126(2) § 115.126(4)	None
VC-2001	EP	63CC-01	112(B) HAPS	40 CFR Part 63, Subpart CC	§ 63.640(c)(1)	All miscellaneous process vents from petroleum refining process units meeting the criteria in	[G]§ 63.645(g) § 63.645(h) § 63.645(h)(1) § 63.645(h)(2)	§ 63.655(g)(7)(ii) § 63.655(i)(6)	§ 63.645(h)(2) § 63.655(f) § 63.655(f)(1)(ii) § 63.655(g) § 63.655(g)(7)

Applicable Requirements Summary

Unit Group Process ID No.	Unit Group Process Type	SOP Index No.	Pollutant	State Rule or Federal Regulation Name	Emission Limitation, Standard or Equipment Specification Citation	Textual Description (See Special Term and Condition 1.B.)	Monitoring And Testing Requirements	Recordkeeping Requirements (30 TAC § 122.144)	Reporting Requirements (30 TAC § 122.145)
						paragraph (a) of this section are part of the affected source.			§ 63.655(g)(7)(i)

Additional Monitoring Requirements

Periodic Monitoring Summary 45

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: DESALTER	
Control Device ID No.: MSSVCU	Control Device Type: Vapor Combustor
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Water Separation	SOP Index No.: R5131-01
Pollutant: VOC	Main Standard: § 115.132(b)(3)
Monitoring Information	
Indicator: Combustion Temperature / Exhaust Gas Temperature	
Minimum Frequency: Once per week	
Averaging Period: n/a*	
Deviation Limit: It would be considered a deviation if six minute combustion temperature is below 1400 degrees Fahrenheit.	
Periodic Monitoring Text: Measure and record the combustion temperature in the combustion chamber or immediately downstream of the combustion chamber. The monitoring instrumentation shall be maintained, calibrated and operated in accordance with manufacturer's specifications or other written procedures. Any monitoring data below the minimum limit shall be considered and reported as a deviation.	

*The permit holder may elect to collect monitoring data on a more frequent basis and calculate the average as specified by the minimum frequency, for purposes of determining whether a deviation has occurred. However, the additional data points must be collected on a regular basis and shall not be collected and used in particular instances to avoid reporting deviations.

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: GRP-TK1	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-01
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Internal Floating Roof	
Minimum Frequency: annually	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if liquid has accumulated on the IFR, the seals are detached, or there are holes or tears in the seal fabric.	
<p>Periodic Monitoring Text: Visually inspect and record the inspection of the internal floating roof to ensure: the roof is floating on the surface of the VOC and, liquid has not accumulated on the internal floating roof, the seals are not detached, and there are no holes or tears in the seal fabric. Any monitoring data in which the roof is not floating on the surface of the VOC, if liquid has accumulated on the internal floating roof, the seals are detached, or if there are holes or tears in the seal fabric shall be considered and reported as a deviation.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: GRP-TK1	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-02
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Internal Floating Roof	
Minimum Frequency: annually	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if liquid has accumulated on the IFR, the seals are detached, or there are holes or tears in the seal fabric.	
<p>Periodic Monitoring Text: Visually inspect and record the inspection of the internal floating roof to ensure: the roof is floating on the surface of the VOC and, liquid has not accumulated on the internal floating roof, the seals are not detached, and there are no holes or tears in the seal fabric. Any monitoring data in which the roof is not floating on the surface of the VOC, if liquid has accumulated on the internal floating roof, the seals are detached, or if there are holes or tears in the seal fabric shall be considered and reported as a deviation.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: GRP-VCU	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 111, Visible Emissions	SOP Index No.: R1111-01
Pollutant: PM (OPACITY)	Main Standard: § 111.111(a)(1)(C)
Monitoring Information	
Indicator: Visible Emissions	
Minimum Frequency: Once per week	
Averaging Period: n/a	
<p>Deviation Limit: There shall be no visible emissions. A Test Method 9 may be conducted if visible emissions are observed and opacity shall not exceed 15%. If Test Method 9 is performed and shows that the opacity limit is exceeded, a deviation would be reported.</p> <p>Periodic Monitoring Text: Visible emissions observations shall be made and recorded. Note that to properly determine the presence of visible emissions, all sources must be in clear view of the observer. The observer shall be at least 15 feet, but not more than 0.25 miles, away from the emission source during the observation. The observer shall select a position where the sun is not directly in the observer's eyes. If the observations cannot be conducted due to weather conditions, the date, time, and specific weather conditions shall be recorded. When condensed water vapor is present within the plume, as it emerges from the emissions outlet, observations must be made beyond the point in the plume at which condensed water vapor is no longer visible. When water vapor within the plume condenses and becomes visible at a distance from the emissions outlet, the observation shall be evaluated at the outlet prior to condensation of water vapor.</p> <p>If visible emissions are observed, the permit holder shall report a deviation. As an alternative, the permit holder may determine the opacity consistent with Test Method 9, as soon as practicable, but no later than 24 hours after observing visible emissions.</p> <p>If the result of the Test Method 9 is an opacity above the corresponding opacity limit, the permit holder shall report a deviation.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: I865TK1	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-03
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Structural Integrity of the Pipe	
Minimum Frequency: Emptied and degassed	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if repairs are not completed prior to tank refilling.	
<p>Periodic Monitoring Text: Inspect to determine the structural integrity of the fill pipe and record each time the storage vessel is emptied and degassed to ensure that it continues to meet the specifications in the above requirement. If the structural integrity of the fill pipe is in question, repairs shall be made before the storage vessel is refilled. It shall be considered and reported as a deviation if the repairs are not completed prior to refilling the storage vessel.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: I865TK1	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-03
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Record of Tank Construction Specifications	
Minimum Frequency: n/a	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if tank fill pipe does not extend from the top of the tank to have a maximum clearance of 6" from the bottom or, a discharge opening is not entirely submerged, when tank is loaded from the side.	
Periodic Monitoring Text: Keep a record of tank construction specifications (e.g. engineering drawings) that show a fill pipe that extends from the top of a tank to have a maximum clearance of six inches (15.2 centimeters) from the bottom or, when the tank is loaded from the side, a discharge opening entirely submerged when the pipe used to withdraw liquid from the tank can no longer withdraw liquid in normal operation.	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: I865TK2	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-03
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Structural Integrity of the Pipe	
Minimum Frequency: Emptied and degassed	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if repairs are not completed prior to tank refilling.	
<p>Periodic Monitoring Text: Inspect to determine the structural integrity of the fill pipe and record each time the storage vessel is emptied and degassed to ensure that it continues to meet the specifications in the above requirement. If the structural integrity of the fill pipe is in question, repairs shall be made before the storage vessel is refilled. It shall be considered and reported as a deviation if the repairs are not completed prior to refilling the storage vessel.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: I865TK2	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-03
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Record of Tank Construction Specifications	
Minimum Frequency: n/a	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if tank fill pipe does not extend from the top of the tank to have a maximum clearance of 6" from the bottom or, a discharge opening is not entirely submerged, when tank is loaded from the side.	
Periodic Monitoring Text: Keep a record of tank construction specifications (e.g. engineering drawings) that show a fill pipe that extends from the top of a tank to have a maximum clearance of six inches (15.2 centimeters) from the bottom or, when the tank is loaded from the side, a discharge opening entirely submerged when the pipe used to withdraw liquid from the tank can no longer withdraw liquid in normal operation.	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: MSSVCU	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 111, Visible Emissions	SOP Index No.: R1111-01
Pollutant: PM (OPACITY)	Main Standard: § 111.111(a)(1)(C)
Monitoring Information	
Indicator: Visible Emissions	
Minimum Frequency: Once per week	
Averaging Period: n/a	
<p>Deviation Limit: There shall be no visible emissions. A Test Method 9 may be conducted if visible emissions are observed and opacity shall not exceed 15%. If Test Method 9 is performed and shows that the opacity limit is exceeded, a deviation would be reported.</p> <p>Periodic Monitoring Text: Visible emissions observations shall be made and recorded. Note that to properly determine the presence of visible emissions, all sources must be in clear view of the observer. The observer shall be at least 15 feet, but not more than 0.25 miles, away from the emission source during the observation. The observer shall select a position where the sun is not directly in the observer's eyes. If the observations cannot be conducted due to weather conditions, the date, time, and specific weather conditions shall be recorded. When condensed water vapor is present within the plume, as it emerges from the emissions outlet, observations must be made beyond the point in the plume at which condensed water vapor is no longer visible. When water vapor within the plume condenses and becomes visible at a distance from the emissions outlet, the observation shall be evaluated at the outlet prior to condensation of water vapor.</p> <p>If visible emissions are observed, the permit holder shall report a deviation. As an alternative, the permit holder may determine the opacity consistent with Test Method 9, as soon as practicable, but no later than 24 hours after observing visible emissions.</p> <p>If the result of the Test Method 9 is an opacity above the corresponding opacity limit, the permit holder shall report a deviation.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: PARTK1	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-03
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Structural Integrity of the Pipe	
Minimum Frequency: Emptied and degassed	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if repairs are not completed prior to tank refilling.	
<p>Periodic Monitoring Text: Inspect to determine the structural integrity of the fill pipe and record each time the storage vessel is emptied and degassed to ensure that it continues to meet the specifications in the above requirement. If the structural integrity of the fill pipe is in question, repairs shall be made before the storage vessel is refilled. It shall be considered and reported as a deviation if the repairs are not completed prior to refilling the storage vessel.</p>	

Periodic Monitoring Summary

Unit/Group/Process Information	
ID No.: PARTK1	
Control Device ID No.: N/A	Control Device Type: N/A
Applicable Regulatory Requirement	
Name: 30 TAC Chapter 115, Storage of VOCs	SOP Index No.: R5112-03
Pollutant: VOC	Main Standard: § 115.112(b)(1)
Monitoring Information	
Indicator: Record of Tank Construction Specifications	
Minimum Frequency: n/a	
Averaging Period: n/a	
Deviation Limit: A deviation would occur if tank fill pipe does not extend from the top of the tank to have a maximum clearance of 6" from the bottom or, a discharge opening is not entirely submerged, when tank is loaded from the side.	
Periodic Monitoring Text: Keep a record of tank construction specifications (e.g. engineering drawings) that show a fill pipe that extends from the top of a tank to have a maximum clearance of six inches (15.2 centimeters) from the bottom or, when the tank is loaded from the side, a discharge opening entirely submerged when the pipe used to withdraw liquid from the tank can no longer withdraw liquid in normal operation.	

Permit Shield

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Permit Shield

The Executive Director of the TCEQ has determined that the permit holder is not required to comply with the specific regulation(s) identified for each emission unit, group, or process in this table.

Unit/Group/Process		Regulation	Basis of Determination
ID No.	Group/Inclusive Units		
F260TK1	N/A	30 TAC Chapter 115, Storage of VOCs	Storage tank true vapor pressure is less than 1.5 psia.
F260TK1	N/A	40 CFR Part 60, Subpart Kb	Storage capacity less than 19,812.9 gallons
F260TK2	N/A	30 TAC Chapter 115, Storage of VOCs	Storage tank true vapor pressure is less than 1.5 psia
F260TK2	N/A	40 CFR Part 60, Subpart Kb	Storage capacity less than 19,812.9 gallons
FUG-1	N/A	40 CFR Part 63, Subpart CC	Equipment leaks that are also subject to the provisions of 40 CFR part 60, subpart GGGa, are required to comply only with the provisions specified in 40 CFR part 60, subpart GGGa.
GRP-DOCK	LD-11, LD-3, LD-4, LD-7	30 TAC Chapter 115, Loading and Unloading of VOC	All loading and unloading of marine vessels is exempt from this division.
GRP-ENGTK	EMGENTK, FWPTK	30 TAC Chapter 115, Storage of VOCs	Storage tank true vapor pressure is less than 1.5 psia
GRP-ENGTK	EMGENTK, FWPTK	40 CFR Part 60, Subpart Kb	Storage capacity less than 39,889.98 gallons storing a VOL with a maximum true vapor pressure less than 2.2 psia
GRP-PTK	T170, T171, T172, T173, T174, T175, T176, T177, T178, T179	40 CFR Part 60, Subpart Kb	Pressure vessels designed to operate in excess of 29.72 psia and without emissions to the atmosphere are not subject to subpart Kb.

Permit Shield

The Executive Director of the TCEQ has determined that the permit holder is not required to comply with the specific regulation(s) identified for each emission unit, group, or process in this table.

Unit/Group/Process		Regulation	Basis of Determination
ID No.	Group/Inclusive Units		
GRP-PTK	T170, T171, T172, T173, T174, T175, T176, T177, T178, T179	40 CFR Part 63, Subpart EEEE	Pressure vessels designed to operate in excess of 29.72 psia and without emissions to the atmosphere are not included in the definition of a storage tank
GRP-SUMP	ISBLSUMP, OSBLSUMP	30 TAC Chapter 115, Storage of VOCs	A process tank does not meet the definition of a storage vessel.
GRP-SUMP	ISBLSUMP, OSBLSUMP	40 CFR Part 60, Subpart Kb	A process tank does not meet the definition of a storage vessel.
GRP-TK2	T126, T127, T128, T129	30 TAC Chapter 115, Storage of VOCs	Storage tank true vapor pressure is less than 1.5 psia
GRP-TK2	T126, T127, T128, T129	40 CFR Part 60, Subpart Kb	Storage capacity is greater than or equal to 151 m3 and store liquid with a maximum true vapor pressure less than 3.5 kilopascals (kPa).
GRP-VCU	VCU1, VCU2	40 CFR Part 60, Subpart Ja	Unit does not combust fuel gas and therefore is not a fuel gas combustion device per 60.101a.
I865TK1	N/A	40 CFR Part 60, Subpart Kb	Storage vessel with capacity less than 75 cubic meters.
I865TK2	N/A	40 CFR Part 60, Subpart Kb	Storage capacity less than 19,812.9 gallons.
OWSOF002	N/A	30 TAC Chapter 115, Water Separation	VOC water separator designed solely to capture storm water, spills, or exterior

Permit Shield

The Executive Director of the TCEQ has determined that the permit holder is not required to comply with the specific regulation(s) identified for each emission unit, group, or process in this table.

Unit/Group/Process		Regulation	Basis of Determination
ID No.	Group/Inclusive Units		
			surface cleanup waters, and is fully covered.
OWSOF002	N/A	40 CFR Part 60, Subpart QQQ	Storm water sewer systems are not subject to the requirements of this subpart.
PARTK1	N/A	40 CFR Part 60, Subpart Kb	Storage vessel with capacity less than 75 cubic meters
SAMPTK	N/A	30 TAC Chapter 115, Storage of VOCs	Storage vessel with capacity less than 1,000 gallons
SAMPTK	N/A	40 CFR Part 60, Subpart Kb	Storage capacity less than 19,812.9 gallons

New Source Review Authorization References

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New Source Review Authorization References

The New Source Review authorizations listed in the table below are applicable requirements under 30 TAC Chapter 122 and enforceable under this operating permit.

Prevention of Significant Deterioration (PSD) Permits	
PSD Permit No.: PSDTX1398	Issuance Date: 04/10/2015
PSD Permit No.: GHGPSDTX62	Issuance Date: 12/04/2014
Title 30 TAC Chapter 116 Permits, Special Permits, and Other Authorizations (Other Than Permits By Rule, PSD Permits, or NA Permits) for the Application Area.	
Authorization No.: 118270	Issuance Date: 04/10/2015
Permits By Rule (30 TAC Chapter 106) for the Application Area	
Number: 106.261	Version No./Date: 11/01/2003
Number: 106.262	Version No./Date: 11/01/2003
Number: 106.263	Version No./Date: 11/01/2001
Number: 106.478	Version No./Date: 09/04/2000
Number: 106.532	Version No./Date: 09/04/2000

*For reference, EPA issued permit PSD-TX-1398-GHG has been assigned permit number GHGPSDTX62.

New Source Review Authorization References by Emissions Unit

The following is a list of New Source Review (NSR) authorizations for emission units listed elsewhere in this operating permit. The NSR authorizations are applicable requirements under 30 TAC Chapter 122 and enforceable under this operating permit.

Unit/Group/Process ID No.	Emission Unit Name/Description	New Source Review Authorization
DESALTER	DESALTER	118270, PSDTX1398, GHGPSDTX62
EMGEN1	EMERGENCY GENERATOR 1	118270, PSDTX1398, GHGPSDTX62
EMGEN2	EMERGENCY GENERTOR 2	118270, PSDTX1398, GHGPSDTX62
EMGENTK	EMERGENCY GENERATOR FUEL TANK	118270, PSDTX1398, GHGPSDTX62
F260TK1	ADDITIVE F260 TANK 1	106.478/09/04/2000, 106.261/11/01/2003, 106.262/11/01/2003
F260TK2	ADDITIVIE F260 TANK 2	106.478/09/04/2000, 106.261/11/01/2003, 106.262/11/01/2003
FL-1	FLARE	118270, PSDTX1398, GHGPSDTX62
FUG-1	FUGITIVIES	118270, PSDTX1398, GHGPSDTX62
FWP1	FIRE WATER PUMP	118270, PSDTX1398, GHGPSDTX62
FWP2	BACKUP FIRE WATER PUMP	118270, PSDTX1398, GHGPSDTX62
FWPTK	FIRE WATER PUMP FUEL TANK	118270, PSDTX1398, GHGPSDTX62
H-1A	FRACTIONATOR HEATER	118270, PSDTX1398, GHGPSDTX62
H-1B	HOT OIL HEATER	118270, PSDTX1398, GHGPSDTX62
H-2A	FRACTIONATOR HEATER	118270, PSDTX1398, GHGPSDTX62
H-2B	HOT OIL HEATER	118270, PSDTX1398, GHGPSDTX62
H-3	TANK HEATER (HOT OIL HEATER)	118270, PSDTX1398, GHGPSDTX62
H-4	TANK HEATER (HOT OIL HEATER)	118270, PSDTX1398, GHGPSDTX62

New Source Review Authorization References by Emissions Unit

The following is a list of New Source Review (NSR) authorizations for emission units listed elsewhere in this operating permit. The NSR authorizations are applicable requirements under 30 TAC Chapter 122 and enforceable under this operating permit.

Unit/Group/Process ID No.	Emission Unit Name/Description	New Source Review Authorization
I865TK1	ADDITIVE I865 TANK 1	106.478/09/04/2000, 106.261/11/01/2003, 106.262/11/01/2003
I865TK2	ADDITIVE I865 TANK 2	106.478/09/04/2000
ISBLSUMP	SUMP	106.261/11/01/2003
LD-11	MARINE LOADING	118270, PSDTX1398, GHGPSDTX62
LD-3	MARINE LOADING	118270, PSDTX1398, GHGPSDTX62
LD-4	MARINE LOADING	118270, PSDTX1398, GHGPSDTX62
LD-7	MARINE LOADING	118270, PSDTX1398, GHGPSDTX62
MSSVCU	MSS VAPOR COMBUSTOR-WASTEWATER TREATMENT	118270, PSDTX1398, GHGPSDTX62
OSBLSUMP	SUMP	106.261/11/01/2003
OWSOF002	OIL-WATER SEPARATOR FOR OUTFALL	106.532/09/04/2000
PARTK1	PARAFFIN TANK	106.478/09/04/2000, 106.261/11/01/2003, 106.262/11/01/2003
PTRUCK	PRESSURIZED TRUCK LOADING	118270, PSDTX1398, GHGPSDTX62
SAMPTK	PRODUCT SAMPLE COLLECTION	118270, PSDTX1398, GHGPSDTX62
T120	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T121	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T122	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T123	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62

New Source Review Authorization References by Emissions Unit

The following is a list of New Source Review (NSR) authorizations for emission units listed elsewhere in this operating permit. The NSR authorizations are applicable requirements under 30 TAC Chapter 122 and enforceable under this operating permit.

Unit/Group/Process ID No.	Emission Unit Name/Description	New Source Review Authorization
T124	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T125	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T126	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T127	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T128	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T129	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T135	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T136	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T137	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T138	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T139	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T154	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T155	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T156	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T157	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T158	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T159	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T160	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T161	STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62

New Source Review Authorization References by Emissions Unit

The following is a list of New Source Review (NSR) authorizations for emission units listed elsewhere in this operating permit. The NSR authorizations are applicable requirements under 30 TAC Chapter 122 and enforceable under this operating permit.

Unit/Group/Process ID No.	Emission Unit Name/Description	New Source Review Authorization
T170	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T171	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T172	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T173	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T174	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T175	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T176	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T177	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T178	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
T179	PRESSURIZED STORAGE VESSEL	118270, PSDTX1398, GHGPSDTX62
VC-2001	FEED SURGE DRUM VENT	118270, PSDTX1398, GHGPSDTX62
VCU1	MARINE VAPOR COMBUSTOR 1	118270, PSDTX1398, GHGPSDTX62
VCU2	MARINE VAPOR COMBUSTOR 2	118270, PSDTX1398, GHGPSDTX62

Appendix A

Acronym List	67
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Acronym List

The following abbreviations or acronyms may be used in this permit:

ACFM	actual cubic feet per minute
AMOC	alternate means of control
ARP	Acid Rain Program
ASTM	American Society of Testing and Materials
B/PA	Beaumont/Port Arthur (nonattainment area)
CAM	Compliance Assurance Monitoring
CD	control device
CEMS	continuous emissions monitoring system
COMS	continuous opacity monitoring system
CVS	closed-vent system
D/FW	Dallas/Fort Worth (nonattainment area)
EP	emission point
EPA	U.S. Environmental Protection Agency
EU	emission unit
FCAA Amendments	Federal Clean Air Act Amendments
FOP	federal operating permit
gr/100 scf	grains per 100 standard cubic feet
HAP	hazardous air pollutant
H/G/B	Houston/Galveston/Brazoria (nonattainment area)
H ₂ S	hydrogen sulfide
ID No.	identification number
lb/hr	pound(s) per hour
MACT	Maximum Achievable Control Technology (40 CFR Part 63)
MMBtu/hr	Million British thermal units per hour
NA	nonattainment
N/A	not applicable
NADB	National Allowance Data Base
NESHAP	National Emission Standards for Hazardous Air Pollutants (40 CFR Part 61)
NO _x	nitrogen oxides
NSPS	New Source Performance Standard (40 CFR Part 60)
NSR	New Source Review
ORIS	Office of Regulatory Information Systems
Pb	lead
PBR	Permit By Rule
PEMS	predictive emissions monitoring system
PM	particulate matter
ppmv	parts per million by volume
PRO	process unit
PSD	prevention of significant deterioration
psia	pounds per square inch absolute
SIP	state implementation plan
SO ₂	sulfur dioxide
TCEQ	Texas Commission on Environmental Quality
TSP	total suspended particulate
TVP	true vapor pressure
U.S.C.	United States Code
VOC	volatile organic compound

Appendix B

Major NSR Summary Table.....	69
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Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
H-1A	Fractionator Heater H-1A	VOC	0.70	2.77	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 18, 21, 47
		NO _x	1.29	3.08			
		CO	4.77	18.98			
		PM	0.58	2.31			
		PM ₁₀	0.58	2.31			
		PM _{2.5}	0.58	2.31			
		SO ₂	2.28	4.95			
		NH ₃	0.58	2.31			
H-1B	Hot Oil Heater H-1B	VOC	0.57	2.27	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 18, 21, 47
		NO _x	1.06	2.53			
		CO	3.91	15.58			
		PM	0.48	1.90			
		PM ₁₀	0.48	1.90			
		PM _{2.5}	0.48	1.90			
		SO ₂	1.87	4.07			
		NH ₃	0.48	1.89			
H-2A	Fractionator Heater H-2A	VOC	0.70	2.77	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 18, 21, 47
		NO _x	1.29	3.08			
		CO	4.77	18.98			
		PM	0.58	2.31			
		PM ₁₀	0.58	2.31			
		PM _{2.5}	0.58	2.31			
		SO ₂	2.28	4.95			
		NH ₃	0.58	2.31			
H-2B	Hot Oil Heater H-2B	VOC	0.57	2.27	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 13, 14, 16, 18, 21, 47	3, 5, 18, 21, 47
		NO _x	1.06	2.53			
		CO	3.91	15.58			
		PM	0.48	1.90			
		PM ₁₀	0.48	1.90			
		PM _{2.5}	0.48	1.90			
		SO ₂	1.87	4.07			
		NH ₃	0.48	1.89			

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
H-3	Tank Heater 3	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	0.09 1.57 1.32 0.12 0.12 0.12 0.24	- - - - - - -	3, 5	3, 5	3, 5
H-4	Tank Heater 4	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	0.09 0.58 0.59 0.12 0.12 0.12 0.24	- - - - - - -	3, 5	3, 5	3, 5
H-3_H-4_CAP	Tank Heaters 3 & 4 Annual Emission Cap	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	- - - - - - -	0.38 4.71 4.18 0.53 0.53 0.53 1.03	3, 5	3, 5	3, 5
FL-1	Flare	VOC NO _x CO SO ₂	0.06 0.03 0.07 <0.01	0.26 0.14 0.28 <0.01	3, 7, 31	31	
FUG-1	Fugitives ⁵	VOC H ₂ S NH ₃	8.36 <0.01 0.09	36.60 0.01 0.40	3, 5, 35, 36	3, 5, 35, 36	3, 5, 35
LOADFUG	Marine Loading Fugitives	VOC H ₂ S	165.07 0.06	82.88 0.03	5, 24, 27, 28	5, 27, 28	5

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
VCU1	Marine Vapor Combustor 1	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	31.65 22.50 30.00 1.12 1.12 1.12 5.19	- - - - - - -	5, 23, 24, 27, 28, 30, 47	5, 23, 27, 28, 30, 47	5, 47
VCU2	Marine Vapor Combustor 2	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	31.65 22.50 30.00 1.12 1.12 1.12 5.19	- - - - - - -	5, 23, 24, 27, 28, 30, 47	5, 23, 27, 28, 30, 47	5, 47
VCU1/VCU2	Marine Vapor Combustors	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	- - - - - - -	10.59 12.35 16.46 0.61 0.61 0.61 2.01	5, 23, 24, 27, 28, 30, 47	5, 23, 27, 28, 30, 47	5, 47
PTRUCK	Pressurized Truck Loading	VOC	4.61	5.89	24, 27, 28	27, 28	
T120	Tank No. 120	VOC H ₂ S	2.62 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T121	Tank No. 121	VOC H ₂ S	2.62 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T122	Tank No. 122	VOC H ₂ S	2.62 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T123	Tank No. 123	VOC H ₂ S	2.62 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
T124	Tank No. 124	VOC H ₂ S	2.62 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T125	Tank No. 125	VOC H ₂ S	2.62 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T126	Tank No. 126	VOC H ₂ S	52.36 0.02	15.78 0.01	5, 6, 8, 10	5, 6, 8, 10	5
T127	Tank No. 127	VOC H ₂ S	52.36 0.02	15.78 0.01	5, 6, 8, 10	5, 6, 8, 10	5
T128	Tank No. 128	VOC H ₂ S	52.36 0.02	15.78 0.01	5, 6, 8, 10	5, 6, 8, 10	5
T129	Tank No. 129	VOC H ₂ S	52.36 0.02	15.78 <0.01	5, 6, 8, 10	5, 6, 8, 10	5
T135	Tank No. 135	VOC H ₂ S	2.32 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T136	Tank No. 136	VOC H ₂ S	2.32 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T137	Tank No. 137	VOC H ₂ S	2.32 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T138	Tank No. 138	VOC H ₂ S	2.32 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T139	Tank No. 139	VOC H ₂ S	2.32 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T154	Tank No. 154	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T155	Tank No. 155	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T156	Tank No. 156	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T157	Tank No. 157	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
T158	Tank No. 158	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T159	Tank No. 159	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T160	Tank No. 160	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
T161	Tank No. 161	VOC H ₂ S	2.56 <0.01	5.09 <0.01	3, 5, 6, 8	3, 5, 6, 8	3, 5
TANKCAP	Tank Cap ⁶	VOC H ₂ S	- -	84.77 0.03	5, 6, 8	5, 6, 8	5
SAMPTK	Product Sample Collection Tank	VOC H ₂ S	0.04 <0.01	0.01 <0.01	5, 6, 8	5, 6, 8	5
FWPTK	Fire Water Pump Fuel Tank	VOC H ₂ S	0.03 <0.01	0.01 <0.01	6, 8	6, 8	
EMGENTK	Emergency Generator Fuel Tank	VOC H ₂ S	0.03 <0.01	0.01 <0.01	6, 8	6, 8	
FWP1	Fire Water Pump	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	0.14 3.54 0.68 0.12 0.12 0.12 <0.01	<0.01 0.18 0.03 <0.01 <0.01 <0.01 <0.01	3, 5, 48	3, 5, 48	3, 5
FWP2	Backup Fire Water Pump	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	0.14 3.54 0.68 0.12 0.12 0.12 <0.01	<0.01 0.18 0.03 <0.01 <0.01 <0.01 <0.01	3, 5, 48	3, 5, 48	3, 5

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
EMGEN1	Emergency Generator 1	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	0.01 8.48 0.59 0.03 0.03 0.03 <0.01	<0.01 0.42 0.03 <0.01 <0.01 <0.01 <0.01	3, 5, 48	3, 5, 48	3, 5
EMGEN2	Emergency Generator 2	VOC NO _x CO PM PM ₁₀ PM _{2.5} SO ₂	0.34 0.82 0.25 0.05 0.05 0.05 <0.01	0.02 0.04 0.01 <0.01 <0.01 <0.01 <0.01	3, 5, 48	3, 5, 48	3, 5
MSSVCU	MSS Vapor Combustor -Wastewater Treatment	VOC NO _x CO SO ₂ H ₂ S	0.09 0.03 0.05 <0.01 <0.01	0.40 0.12 0.22 0.03 <0.01	3, 30, 33, 34, 38	3, 30, 33, 38	3
PTKMSS	Pressurized Trucks MSS Activities	VOC	417.22	3.18	38, 43	38, 39, 43	
VTRUCK	Vacuum Trucks	VOC H ₂ S	1.65 <0.01	0.10 <0.01	38, 43	38, 43	
FRTANK	Frac Tanks	VOC H ₂ S	155.70 0.06	0.17 <0.01	38, 44	38, 44	
SAMPLE	Product Sampling	VOC H ₂ S	0.74 <0.01	1.62 <0.01	38	38	

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
MSSVCU	MSS Vapor Combustor - Pressure Tank MSS	VOC NO _x CO PM PM ₁₀ PM _{2.5}	128.02 38.41 70.54 1.91 1.91 1.91	0.17 0.05 0.09 <0.01 <0.01 <0.01	30, 38, 47	30, 38, 47	47
VPIPEMSS	Vessels & Piping MSS (Uncontrolled)	VOC H ₂ S	53.65 0.02	4.80 <0.01	38, 39	38, 39	
FL-1	Vessels & Piping MSS (Controlled)	VOC H ₂ S NO _x CO SO ₂	91.45 <0.01 13.72 25.19 0.04	2.74 <0.01 0.41 0.76 <0.01	3, 5, 31, 38	31, 38	
TKLAND-ATM	Uncontrolled Floating Roof Tank Landing Cap 7	VOC H ₂ S	22.48 <0.01	0.86 <0.01	38, 41	38, 41	
MSSVCU	Controlled Floating Roof Tank Landing Cap 6	VOC NO _x CO H ₂ S PM PM ₁₀ PM _{2.5} SO ₂	101.37 9.74 17.89 0.04 0.24 0.24 0.24 2.21	1.93 0.35 0.64 <0.01 0.02 0.02 0.02 0.07	30, 38, 41	30, 38, 41	
TKLAND-CAP	Overall Floating Roof Tank Landing Cap	VOC NO _x CO H ₂ S PM PM ₁₀ PM _{2.5} SO ₂	101.37 9.74 17.89 0.04 0.24 0.24 0.24 2.21	2.79 0.35 0.64 <0.01 0.02 0.02 0.02 0.07	38, 41	38, 41	

Major NSR Summary Table

Permit Number: 118270 and PSDTX1398					Issuance Date: April 10, 2015		
Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates		Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			lbs/hour	TPY (4)	Special Conditions	Special Conditions	Special Conditions
MSSVCU	MSS Vapor Combustion Unit Pilot/Assist Gas	NO _x	3.78	2.76	30, 38	30, 38	
		CO	6.94	5.07			
		VOC	0.14	0.10			
		H ₂ S	<0.01	<0.01			
		PM	0.19	0.14			
		PM ₁₀	0.19	0.14			
		PM _{2.5}	0.19	0.14			
		SO ₂	0.37	0.27			

Footnotes:

- (1) Emission point identification - either specific equipment designation or emission point number from plot plan.
- (2) Specific point source name. For fugitive sources, use area name or fugitive source name.
- (3) VOC - volatile organic compounds as defined in Title 30 Texas Administrative Code § 101.1
- H₂S - hydrogen sulfide
- NO_x - total oxides of nitrogen
- SO₂ - sulfur dioxide
- PM - total particulate matter, suspended in the atmosphere, including PM₁₀ and PM_{2.5}, as represented
- PM₁₀ - total particulate matter equal to or less than 10 microns in diameter, including PM_{2.5}, as represented
- PM_{2.5} - particulate matter equal to or less than 2.5 microns in diameter
- CO - carbon monoxide
- (4) Compliance with annual emission limits (tons per year) is based on a 12 month rolling period.
- (5) Emission rate is an estimate and is enforceable through compliance with the applicable special condition(s) and permit application representations.
- (6) Emission limits for EPN TANKCAP apply to total rolling 12-months emissions from all storage tanks identified in Special Condition 12.
- (7) Emission caps for tank floating roof landing activities apply to all floating roof tanks authorized by this permit (Identified in Special Condition 12).

Major NSR Summary Table

Permit Number: GHGPSDTX62				Issuance Date: December 4, 2014			
Emission Point Number (EPN)	Source Name	GHG Mass Basis		CO ₂ e ^{1,2} (TPY)	Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			TPY ¹		Special Conditions	Special Conditions	Special Conditions
H-1A	Fractionator Heater - Train 1	CO ₂	60,049	60,111	III.B.1, III.C, IV.1, V.A, V.B, V.C, V.L	III.B.1, III.C IV.1, IV.2, IV.3, IV.4, IV.7, V.B, V.C	IV.1, IV.3, IV.4, V.B, V.C, V.D, V.J
		CH ₄	1.13				
		N ₂ O	0.11				
H-1B	Hot Oil Heater - Train 1	CO ₂	49,289	49,340	III.B.1, III.C, IV.1, V.A, V.B, V.C, V.L	III.B.1, III.C IV.1, IV.2, IV.3, IV.4, IV.7, V.B, V.C	IV.1, IV.3, IV.4, V.B, V.C, V.D, V.J
		CH ₄	0.93				
		N ₂ O	0.09				
H-2A	Fractionator Heater - Train 2	CO ₂	60,049	60,111	III.B.1, III.C, IV.1, V.A, V.B, V.C, V.L	III.B.1, III.C IV.1, IV.2, IV.3, IV.4, IV.7, V.B, V.C	IV.1, IV.3, IV.4, V.B, V.C, V.D, V.J
		CH ₄	1.13				
		N ₂ O	0.11				
H-2B	Hot Oil Heater - Train 2	CO ₂	49,289	49,340	III.B.1, III.C, IV.1, V.A, V.B, V.C, V.L	III.B.1, III.C IV.1, IV.2, IV.3, IV.4, IV.7, V.B, V.C	IV.1, IV.3, IV.4, V.B, V.C, V.D, V.J
		CH ₄	0.93				
		N ₂ O	0.09				
H-4	Tank Heater	CO ₂	4,099	4,103	III.B.1, III.C, IV.1, V.A	III.B.1, III.C IV.1, IV.2, IV.3, IV.4, IV.7, V.B, V.C	IV.1, IV.3, IV.4, V.B
		CH ₄	0.075				
		N ₂ O	No Numerical Limit Established ³				
FL-1	Flare	CO ₂	576	577	III.B.2, IV.1, V.F, V.G, V.L	III.B.2, IV.1, IV.2, IV.3, IV.4, IV.7 V.F, V.G, V.L	IV.1, IV.3, IV.4, V.F, V.G, V.L
		CH ₄	0.02				
		N ₂ O	No Numerical Limit Established ³				
FWP1 FWP2	Diesel-powered Fire Water Pumps	CO ₂	64	64	III.B.5, IV.1	III.B.5, IV.2, IV.3, IV.4, IV.7	IV.1, IV.3, IV.4
		CH ₄	No Numerical Limit Established ³				
		N ₂ O	No Numerical Limit Established ³				

Major NSR Summary Table

Permit Number: GHGPSDTX62					Issuance Date: December 4, 2014		
Emission Point Number (EPN)	Source Name	GHG Mass Basis		CO ₂ e ^{1, 2}	Monitoring and Testing Requirements	Recordkeeping Requirements	Reporting Requirements
			TPY ¹	(TPY)	Special Conditions	Special Conditions	Special Conditions
EMGEN1 EMGEN2	Diesel-powered Emergency Generators	CO ₂	47	47	III.B.5, IV.1	III.B.5, IV.2, IV.3, IV.4, IV.7	IV.1, IV.3, IV.4
		CH ₄	No Numerical Limit Established ³				
		N ₂ O	No Numerical Limit Established ³				
MSSVCU	MSS Vapor Combustion Unit	CO ₂	2,645	2,648	III.B.4, IV.1, V.H, V.L	III.B.4, IV.2, IV.3, IV.4, IV.7, V.H, V.I	IV.1, IV.3, IV.4, V.H, V.I, V.J, V.K
		CH ₄	0.056				
		N ₂ O	No Numerical Limit Established ³				
FUG-1	Components Fugitive Leaks Emissions	CH ₄	No Numerical Limit Established ⁴	No Numerical Limit Established ⁴	III.B.3, IV.1	III.B.3, IV.2, IV.3, IV.4, IV.7	IV.3
Totals ⁵		CO ₂	226,106	CO ₂ e 226,502 ⁶			
		CH ₄	10.565				
		N ₂ O	0.426				

Footnotes:

¹ The TPY emission limits specified in this table are not be exceeded for this facility and include emissions from the facility during all operations and include MSS activities.

² Global Warming Potentials (GWP): CO₂ = 1, CH₄ = 25, N₂O = 298, SF₆ = 22,800.

³ All values indicated as "No Numerical Limit Established" are less than 0.1 TPY with appropriate rounding. The emission limit will be a design/work practice standard as specified in the permit

⁴ Fugitive process emission from FUG-1 are estimated to be 6.42 TPY of CH₄ and 160 TPY of CO₂e.

⁵ The total emissions for CH₄ and CO₂e include the PTE for process fugitives emission of CH₄. The total emissions for CO₂e, also, include PTE emissions of an existing tank heater (H-3). These totals are given for informational purposes only and do not constitute emission limits.

⁶ Two existing marine vessel loading vapor combustion units (EPNs: VCU1 and VCU2) and one existing tank heater (EPN: H-3) at the Corpus Christi Terminal will be used as part of the condensate splitter process but are not being physically modified themselves. They have a total estimated GHG emissions of 15,723 TPY CO₂e. As explained in the GHG Permitting Guidance, for the purposes of determining whether a PSD permits is required, the EPA requires a permitting authority to look beyond the emissions unit that is modified (across the entire source) to determine the extent of emission increases that result from the modification. However, the BACT applies only to the emission unit(s) that have been modified or added to the existing facility. See PSD and Title V permitting Guidance for Greenhouse Gases at 23. As a result, any additional GHG emissions from the condensate splitter process have been included in calculation the total tpy CO₂e to determine the PSD applicability, EPS will not, however, conduct a BACT analysis for the existing marine vessel loading vapor combustion units (VCU1 and VCU2) and tank heater (H-3) as part of this permit.



TEXAS COMMISSION ON ENVIRONMENTAL QUALITY
AIR QUALITY PERMIT



A Permit Is Hereby Issued To
Magellan Processing, L.P.
Authorizing the Construction and Operation of
Condensate Splitter Facility
Located at **Corpus Christi, Nueces County, Texas**
Latitude 27° 48' 34" Longitude -97° 26' 10"

Permits: 118270 and PSDTX1398

Issuance Date : April 10, 2015

Expiration Date: April 10, 2025

For the Commission

1. **Facilities** covered by this permit shall be constructed and operated as specified in the application for the permit. All representations regarding construction plans and operation procedures contained in the permit application shall be conditions upon which the permit is issued. Variations from these representations shall be unlawful unless the permit holder first makes application to the Texas Commission on Environmental Quality (commission) Executive Director to amend this permit in that regard and such amendment is approved. [Title 30 Texas Administrative Code 116.116 (30 TAC 116.116)]
2. **Voiding of Permit.** A permit or permit amendment is automatically void if the holder fails to begin construction within 18 months of the date of issuance, discontinues construction for more than 18 months prior to completion, or fails to complete construction within a reasonable time. Upon request, the executive director may grant an 18-month extension. Before the extension is granted the permit may be subject to revision based on best available control technology, lowest achievable emission rate, and netting or offsets as applicable. One additional extension of up to 18 months may be granted if the permit holder demonstrates that emissions from the facility will comply with all rules and regulations of the commission, the intent of the Texas Clean Air Act (TCAA), including protection of the public's health and physical property; and (b)(1) the permit holder is a party to litigation not of the permit holder's initiation regarding the issuance of the permit; or (b)(2) the permit holder has spent, or committed to spend, at least 10 percent of the estimated total cost of the project up to a maximum of \$5 million. A permit holder granted an extension under subsection (b)(1) of this section may receive one subsequent extension if the permit holder meets the conditions of subsection (b)(2) of this section. [30 TAC 116.120(a), (b) and (c)]
3. **Construction Progress.** Start of construction, construction interruptions exceeding 45 days, and completion of construction shall be reported to the appropriate regional office of the commission not later than 15 working days after occurrence of the event. [30 TAC 116.115(b)(2)(A)]
4. **Start-up Notification.** The appropriate air program regional office shall be notified prior to the commencement of operations of the facilities authorized by the permit in such a manner that a representative of the commission may be present. The permit holder shall provide a separate notification for the commencement of operations for each unit of phased construction, which may involve a series of units commencing operations at different times. Prior to operation of the facilities authorized by the permit, the permit holder shall identify the source or sources of allowances to be utilized for compliance with Chapter 101, Subchapter H, Division 3 of this title (relating to Mass Emissions Cap and Trade Program). [30 TAC 116.115(b)(2)(B)(iii)]
5. **Sampling Requirements.** If sampling is required, the permit holder shall contact the commission's Office of Compliance and Enforcement prior to sampling to obtain the proper data forms and procedures. All sampling and testing procedures must be approved by the executive director and coordinated with the regional representatives of the commission. The permit holder is also responsible for providing sampling facilities and conducting the sampling operations or contracting with an independent sampling consultant. [30 TAC 116.115(b)(2)(C)]

6. **Equivalency of Methods.** The permit holder must demonstrate or otherwise justify the equivalency of emission control methods, sampling or other emission testing methods, and monitoring methods proposed as alternatives to methods indicated in the conditions of the permit. Alternative methods shall be applied for in writing and must be reviewed and approved by the executive director prior to their use in fulfilling any requirements of the permit. [30 TAC 116.115(b)(2)(D)]
7. **Recordkeeping.** The permit holder shall maintain a copy of the permit along with records containing the information and data sufficient to demonstrate compliance with the permit, including production records and operating hours; keep all required records in a file at the plant site. If, however, the facility normally operates unattended, records shall be maintained at the nearest staffed location within Texas specified in the application; make the records available at the request of personnel from the commission or any air pollution control program having jurisdiction; comply with any additional recordkeeping requirements specified in special conditions attached to the permit; and retain information in the file for at least two years following the date that the information or data is obtained. [30 TAC 116.115(b)(2)(E)]
8. **Maximum Allowable Emission Rates.** The total emissions of air contaminants from any of the sources of emissions must not exceed the values stated on the table attached to the permit entitled "Emission Sources--Maximum Allowable Emission Rates." [30 TAC 116.115(b)(2)(F)]
9. **Maintenance of Emission Control.** The permitted facilities shall not be operated unless all air pollution emission capture and abatement equipment is maintained in good working order and operating properly during normal facility operations. The permit holder shall provide notification for upsets and maintenance in accordance with 30 TAC 101.201, 101.211, and 101.221 of this title (relating to Emissions Event Reporting and Recordkeeping Requirements; Scheduled Maintenance, Startup, and Shutdown Reporting and Recordkeeping Requirements; and Operational Requirements). [30 TAC 116.115(b)(2)(G)]
10. **Compliance with Rules.** Acceptance of a permit by an applicant constitutes an acknowledgment and agreement that the permit holder will comply with all rules, regulations, and orders of the commission issued in conformity with the TCAA and the conditions precedent to the granting of the permit. If more than one state or federal rule or regulation or permit condition is applicable, the most stringent limit or condition shall govern and be the standard by which compliance shall be demonstrated. Acceptance includes consent to the entrance of commission employees and agents into the permitted premises at reasonable times to investigate conditions relating to the emission or concentration of air contaminants, including compliance with the permit. [30 TAC 116.115(b)(2)(H)]
11. **This** permit may not be transferred, assigned, or conveyed by the holder except as provided by rule. [30 TAC 116.110(e)]
12. **There** may be additional special conditions attached to a permit upon issuance or modification of the permit. Such conditions in a permit may be more restrictive than the requirements of Title 30 of the Texas Administrative Code. [30 TAC 116.115(c)]
13. **Emissions** from this facility must not cause or contribute to a condition of "air pollution" as defined in Texas Health and Safety Code (THSC) 382.003(3) or violate THSC 382.085. If the executive director determines that such a condition or violation occurs, the holder shall implement additional abatement measures as necessary to control or prevent the condition or violation.
14. **The** permit holder shall comply with all the requirements of this permit. Emissions that exceed the limits of this permit are not authorized and are violations of this permit.

Special Conditions

Permit Numbers 118270 and PSDTX1398

1. This permit covers only those sources of emissions listed in the attached table entitled “Emission Sources – Maximum Allowable Emission Rates” (MAERT), and those sources are limited to the emission limits and other conditions specified in that table.
2. Non-fugitive emissions from relief valves, safety valves, or rupture discs of gases containing volatile organic compounds (VOC) at a concentration of greater than 1 percent are not authorized by this permit unless authorized on the MAERT. Any releases directly to atmosphere from relief valves, safety valves, or rupture discs of gases containing VOC at a concentration greater than 1 weight percent are not consistent with good practice for minimizing emissions.

Federal Applicability

3. These facilities shall comply with all applicable requirements of the U.S. Environmental Protection Agency (EPA) regulations on Standards of Performance for New Stationary Sources promulgated in Title 40 Code of Federal Regulations Part 60 (40 CFR Part 60):
 - A. Subpart A, General Provisions.
 - B. Subpart Db, Industrial-Commercial-Institutional Steam Generating Units.
 - C. Subpart Kb, Volatile Organic Liquid Storage Vessels.
 - D. Subpart Ja, Petroleum Refineries.
 - E. Subpart GGGa, Equipment Leaks of VOC in Petroleum Refineries.
 - F. Subpart QQQ, Petroleum Refinery Wastewater Systems.
 - G. Subpart IIII, Stationary Compression Ignition Internal Combustion Engines.
4. These facilities shall comply with all applicable requirements of the U.S. Environmental Protection Agency (EPA) regulations on National Emission Standards for Hazardous Air Pollutants in 40 CFR Part 61:
 - A. Subpart A, General Provisions.
 - B. Subpart FF, Benzene Waste Operations.
5. These facilities shall comply with all applicable requirements of the U.S. Environmental Protection Agency (EPA) regulations on National Emission Standards for Hazardous Air Pollutants for Source Categories in 40 CFR Part 63:
 - A. Subpart A, General Provisions.
 - B. Subpart Y, Marine Tank Vessel Loading Operations.
 - C. Subpart CC, Petroleum Refineries.
 - D. Subpart EEEE, Organic Liquids Distribution (Non-Gasoline).
 - E. Subpart ZZZZ, Stationary Reciprocating Internal Combustion Engines.

- F. Subpart DDDDD, Industrial, Commercial and Institutional Boilers and Process Heaters.

Emission Standards and Operational Specifications

Storage Tanks

6. The dissolved hydrogen sulfide in any crude oil shall not exceed 5 parts per million by weight (ppmw).
 - A. In order to demonstrate compliance with this Special Condition, the permit holder shall determine the dissolved hydrogen sulfide concentration of each crude oil stock to be stored in the storage tanks identified in Special Condition 12. The hydrogen sulfide concentration may be determined using method ASTM UOP163-10 or ASTM D7621-14. Any additional method of sampling method and analysis used must be approved by the TCEQ.
 - B. The frequency of sampling shall be the more frequent of:
 - (1) annual; or
 - (2) within 60 days of any change of service for an affected tank.
 - C. Records of H₂S concentrations measured to meet the requirements of this condition shall be maintained at the plant site.
7. The true vapor pressure of any liquid stored at this facility shall not exceed 11.0 psi. Storage of any product with a true vapor pressure of 11.0 psi or greater at ambient conditions is not authorized by this permit.
8. Storage tanks are subject to the following requirements: The control requirements specified in parts A–C of this condition shall not apply (1) where the VOC has an aggregate partial pressure of less than 0.50 psia at the maximum feed temperature or 95°F, whichever is greater, or (2) to storage tanks smaller than 25,000 gallons.
 - A. The tank emissions must be controlled as specified in one of the paragraphs below:
 - (1) An internal floating deck or “roof” shall be installed. A domed external floating roof tank is equivalent to an internal floating roof tank. The floating roof shall be equipped with one of the following closure devices between the wall of the storage vessel and the edge of the floating roof: (1) a liquid-mounted seal, (2) two continuous seals mounted one above the other, or (3) a mechanical shoe seal.
 - (2) An open-top tank shall contain a floating roof (external floating roof tank) which uses double seal or secondary seal technology provided the primary seal consists of either a mechanical shoe seal or a liquid-mounted seal and the secondary seal is rim-mounted. A weathershield is not approvable as a secondary seal unless specifically reviewed and determined to be vapor-tight.

- B. For any tank equipped with a floating roof, the permit holder shall perform the visual inspections and any seal gap measurements specified in Title 40 Code of Federal Regulations § 60.113b (40 CFR § 60.113b) Testing and Procedures (as amended at 54 FR 32973, Aug. 11, 1989) to verify fitting and seal integrity. Records shall be maintained of the dates inspection was performed, any measurements made, results of inspections and measurements made (including raw data), and actions taken to correct any deficiencies noted.
 - C. The floating roof design shall incorporate sufficient flotation to conform to the requirements of API Code 650 dated November 1, 1998 except that an internal floating cover need not be designed to meet rainfall support requirements and the materials of construction may be steel or other materials.
 - D. Except for labels, logos, etc. not to exceed 15 percent of the tank total surface area, uninsulated tank exterior surfaces exposed to the sun shall be white or unpainted aluminum. Storage tanks must be equipped with permanent submerged fill pipes.
 - E. The permit holder shall maintain an emissions record which includes calculated emissions of VOC from all storage tanks during the previous calendar month and the past consecutive 12 month period. The record shall include tank identification number, control method used, tank capacity in gallons, name of the material stored, VOC molecular weight, VOC monthly average temperature in degrees Fahrenheit, VOC vapor pressure at the monthly average material temperature in psia, VOC throughput for the previous month and year-to-date. Records of VOC monthly average temperature are not required to be kept for unheated tanks which receive liquids that are at or below ambient temperatures.
9. Each tank shall be designed to completely drain its entire contents to a sump in a manner that leaves no more than 8 gallons of free-standing liquid in the tank or tank sump.
10. The holder of this permit shall maintain the temperature of the liquid in Tanks T126–T129 at less than 150 °F. The tank temperature shall be continuously monitored and the temperature shall be recorded daily and during tank filling.

The temperature monitor shall be calibrated on an annual basis to meet an accuracy specification of ± 0.75 percent of the temperature being measured expressed in degrees Celsius or $\pm 2.5^{\circ}\text{C}$. Up to 5 percent invalid monitoring data is acceptable on a rolling 12 month basis provided it is only generated when the monitor is broken down, out-of-control (producing inaccurate data); being repaired, having maintenance performed, or being calibrated. The data availability shall be calculated as the total tank operating hours for which quality assured data was recorded divided by the total tank hours in service. Invalid data generated due to other reasons is not allowed. The measurements missed shall be estimated using engineering judgment and the methods used recorded.

If measured temperature indicates an excursion above the maximum temperature requirement of this Special Condition, the permit holder may take up to 72 hours to lower the product temperature such that it is below the permissible level. The method used to lower the product temperature shall be documented.

11. Emissions for tanks shall be calculated using: the Texas Commission on Environmental Quality (TCEQ) publication titled “Technical Guidance Package for Chemical Sources — Storage Tanks.”
12. Storage tank service is limited as follows.

Tank Group	Tank Type	Product(s)
T120–T125 (104 MBbl tanks)	Internal Floating Roof	Condensate, Light Naphtha, Heavy Naphtha, Jet Fuel, Distillate
T126–T129 (87 MBbl tanks)	Fixed Roof	Resid
T135–T139 (152 MBbl tanks)	Internal Floating Roof	Condensate, Light Naphtha, Heavy Naphtha, Jet Fuel, Distillate
T154–T161 (113 MBbl tanks)	Internal Floating Roof	Condensate, Light Naphtha, Heavy Naphtha, Jet Fuel, Distillate

Process Heaters

13. The holder of this permit shall install a continuous H₂S monitoring system in a portion of the fuel gas system common to the fuel gas combustion devices covered by this permit (EPNs H-1A, H-1B, H-2A, H-2B) in accordance with the fuel sulfur monitoring requirements of 40 CFR §60.107a.
14. The permit holder shall not burn in any fuel gas combustion device (listed below) any fuel gas that contains H₂S in excess of 110 ppmv determined hourly on a 1-hour rolling average basis and H₂S in excess of 60 ppmv determined daily on a 365 successive calendar day rolling average basis.

EPN	Name
H-1A	Fractionator Heater H-1A
H-1B	Hot Oil Heater H-1B
H-2A	Fractionator Heater H-2A
H-2B	Hot Oil Heater H-2B

15. Tank Heaters (EPNs H-3 and H-4) shall be fired with natural gas containing no more than 5 grains of total sulfur per 100 dry standard cubic feet (dscf).
16. For heaters identified in Special Condition 14, the fuel gas shall be sampled every 6 months to determine net heating value. Test results from the fuel supplier may be used to satisfy this requirement.
17. Emission limitations for process heaters.
 - A. Emissions from any individual process heater (EPNs H-1A, H-1B, H-2A, H-2B) shall not exceed the following:

Pollutant	1-hr average	Rolling 12-months average
NO _x	0.01 lb/MMBtu	0.006 lb/MMBtu
CO	50 ppmvd @ 3% O ₂	—
NH ₃	10 ppmvd @ 3% O ₂	—

Compliance with the NO_x emission limitations of this Paragraph shall be achieved through the use of Selective Catalytic Reduction (SCR).

- B. Emissions from tank heater H-4 (EPN H-4) shall not exceed the following:

Pollutant	Rolling 12-months average
NO _x	0.036 lb/MMBtu
CO	50 ppmvd @ 3% O ₂

18. The permit holder shall continuously monitor ammonia emissions from the heater SCR systems (EPNs H-1A, H-1B, H-2A, H-2B) using one of the following methods:
- A. Install, calibrate, maintain, and operate a CEMS to measure and record the concentrations of NH₃. The NH₃ concentrations shall be corrected and reported in accordance with Special Condition No. 21.
- B. Install and operate, in addition to the NO_x CEMS required under Special Condition No. 21, a second NO_x CEMS upstream of the control device. Perform the measurements and calculations associated with the mass balance method specified in 30 TAC §117.8130(1), using NO_x CEMS data to determine the NO_x concentration differential across the control device.

All CEMS specified in this condition must meet the requirements of Special Condition No. 21. Quality-assured (or valid) data must be generated when gas is directed to the SCR system. Loss of valid data due to periods of monitor break down, out-of-control operation (producing inaccurate data), repair, maintenance, or calibration may be exempted provided it does not exceed 5 percent of the time that gas is directed to the SCR system over the previous rolling 12-month period. The measurements missed shall be estimated using engineering judgment and the methods used recorded.

19. Aqueous ammonia storage tanks shall be located within a physical barrier to traffic. Tank containment shall be employed with a minimum of 110 percent of tank volume. Vapors resulting from the filling operations of the aqueous ammonia storage tank(s) shall be collected and vapor returned back to the transport vessel.
20. Aqueous ammonia storage tanks shall be vapor balanced so as to eliminate working loss emissions to the atmosphere resulting from filling operations. The fill level of the aqueous ammonia storage tank shall not exceed a level that is in line with good engineering practices, and shall include a high level alarm and a high-high level alarm. In addition, sealless pumps shall be used in all piping handling aqueous ammonia.

21. The permit holder shall install, calibrate, and maintain a continuous emission monitoring system (CEMS) to measure and record the in-stack concentration of CO, NO_x and O₂ from the heaters (EPNs H-1A, H-1B, H-2A, and H-2B).
 - A. The CEMS shall meet the design and performance specifications, pass the field tests, and meet the installation requirements and the data analysis and reporting requirements specified in the applicable Performance Specification Nos. 1 through 9, Title 40 Code of Federal Regulation Part 60 (40 CFR Part 60), Appendix B. If there are no applicable performance specifications in 40 CFR Part 60, Appendix B, contact the TCEQ Office of Air, Air Permits Division for requirements to be met.
 - B. Section 1 below applies to sources subject to the quality-assurance requirements of 40 CFR Part 60, Appendix F; section 2 applies to all other sources:
 - (1) The permit holder shall assure that the CEMS meets the applicable quality-assurance requirements specified in 40 CFR Part 60, Appendix F, Procedure 1. Relative accuracy exceedances, as specified in 40 CFR Part 60, Appendix F, § 5.2.3 and any CEMS downtime shall be reported to the appropriate TCEQ Regional Manager, and necessary corrective action shall be taken. Supplemental stack concentration measurements may be required at the discretion of the appropriate TCEQ Regional Manager.
 - (2) For the NH₃, CO, NO_x and O₂ CEMS, unless Appendix F is otherwise required by NSPS, state law or regulation, or permit or approval, in lieu of the requirements of 40 CFR Part 60 Appendix F 5.1.1, 5.1.3, and 5.1.4, the permit holder may conduct:
 - (a) either a Relative Accuracy Audit (RAA) or a Relative Accuracy Test Audit (RATA) once every three (3) years; and
 - (b) a Cylinder Gas Audit (CGA) each calendar quarter in which the RAA or RATA is not performed.
 - (3) The system shall be zeroed and spanned daily, and corrective action taken when the 24-hour span drift exceeds two times the amounts specified in the applicable Performance Specification Nos. 1 through 9, 40 CFR Part 60, Appendix B, or as specified by the TCEQ if not specified in Appendix B. Zero and span is not required on weekends and plant holidays if instrument technicians are not normally scheduled on those days.

Each monitor shall be quality-assured at least quarterly using Cylinder Gas Audits (CGA) in accordance with 40 CFR Part 60, Appendix F, Procedure 1, Section 5.1.2, with the following exception: a relative accuracy test audit (RATA) is not required once every four quarters (i.e., four successive quarterly CGA may be conducted). An equivalent quality-assurance method approved by the TCEQ may also be used. Successive quarterly audits shall occur no closer than two months.

All CGA exceedances of ± 15 percent accuracy indicate that the CEMS is out of control.

- C. The permit holder shall install and operate a fuel flow meter to measure the gas fuel usage for each boiler and each heater. The monitored data shall be reduced to an hourly average flow rate at least once every day, using a minimum of four equally-spaced data points from each one-hour period. Each monitoring device shall be calibrated at a frequency in accordance with the manufacturer's specifications or at least annually, whichever is more frequent, and shall be accurate to within 5 percent. In lieu of monitoring fuel flow, the permit holder may monitor stack exhaust flow using the flow monitoring specifications of 40 Code of Federal Regulations (CFR) Part 60, Appendix B, Performance Specification 6 or 40 CFR Part 75, Appendix A.
- D. CEMs pollutant concentration data shall be reduced to at least 1-hour average concentrations. For rolling 12-months, the flow weighted average shall be determined and recorded at least monthly. Concentrations shall be used to calculate, following EPA Test Method 19,
 - (1) Compliance with Special Condition 1 for CO, NO_x and NH₃ for EPNs H-1A, H-1B, H-2A, and H-2B; and
 - (2) Compliance with Special Condition 17.Fuel flow shall be determined in accordance with Paragraph C of this condition. Fuel heating value shall be determined as the most recent value determined as required by Special Condition 15.
- E. All monitoring data and quality-assurance data shall be maintained by the source. The data from the CEMS may, at the discretion of the TCEQ, be used to determine compliance with the conditions of this permit.
- F. The appropriate TCEQ Regional Office shall be notified at least 30 days prior to any required RATA in order to provide them the opportunity to observe the testing.

Quality-assured (or valid) data must be generated when the heater is operating except during the performance of a daily zero and span check. Loss of valid data due to periods of monitor break down, out-of-control operation (producing inaccurate data), repair, maintenance, or calibration may be exempted provided it does not exceed 5 percent of the time (in minutes) that the heater operated over the previous rolling 12-month period. The measurements missed shall be estimated using engineering judgement and the methods used recorded. Options to increase system reliability to an acceptable value, including a redundant CEMS, may be required by the TCEQ Regional Manager.

Loading Operations

- 22. All loading emissions shall be directed to a vapor combustor for control if the liquid loaded has a VOC vapor pressure greater than 0.50 psia at 95° F.
- 23. Marine loading vapors directed to a vapor combustor shall be routed through a blower system which directs the vapors to a vapor combustor. Flanged connections shall be used for all loading operations. Marine vessels shall not be loaded unless the vapor collection system is properly connected and the entire collection and destruction system is working as designed.

- A. The marine loading vapor collection system shall be operated such that the vacuum maintained in the collection system during loading is no less than 0.5 inches of water and that the vessel being loaded is also under a vacuum. The collection system vacuum shall be continuously monitored and recorded at least once every six minutes. The vacuum monitor shall be installed, calibrated at least annually, and maintained according to the manufacturer's specifications. The device shall have an accuracy of the greater of ± 5 percent of the vacuum being measured or ± 0.15 inches of water.
- B. If the vessel must remain inerted during loading (it is not possible to draw a vacuum on the marine vessel) due to safety concerns, the following requirements apply.
- Before loading, the owner or operator of the marine terminal shall verify that the marine vessel has passed an annual vapor tightness test as specified in 40 CFR §63.565(c) (September 19, 1995) or 40 CFR §61.304(f) (October 17, 2000).
24. All lines and connectors shall be visually inspected for any defects prior to hookup. Lines and connectors that are visibly damaged shall be removed from service. Operations shall cease immediately upon detection of any liquid leaking from the lines or connections.
25. Loading operations are limited to the liquids identified below at the rates indicated.

Liquid	Loading rate (Bbl/hr)
Condensate	20,000
Light Naphtha	20,000
Heavy Naphtha	20,000
Jet Fuel	20,000
Distillate	20,000
Resid	10,000

26. The total loading rate during any 1-hr period for all loading operations controlled by any individual VCU shall not exceed 10,000 Bbl/hr.
27. The permit holder shall maintain and update a monthly emissions record which includes calculated emissions of VOC from all loading operations over the previous rolling 12 month period. The record shall include the loading spot, control method used, quantity loaded in gallons, name of the liquid loaded, vapor molecular weight, liquid temperature in degrees Fahrenheit, liquid vapor pressure at the liquid temperature in psia, liquid throughput for the previous month and rolling 12 months to date. Records of VOC temperature are not required to be kept for liquids loaded from unheated tanks which receive liquids that are at or below ambient temperatures. Emissions shall be calculated using the TCEQ publication titled "Technical Guidance Package for Chemical Sources — Loading Operations."
28. The following actions shall be taken prior to removing loading lines/hoses from marine vessels and shore facilities.

- A. After the transfer is complete, the loading line/hose shall be isolated at the connections to the marine vessel and the shore piping. Following dock line/hose isolation, liquid shall be drained from the line/hose either by elevating it to allow it to drain by gravity into the vessel prior to isolation or pumping the liquid from the line back to the pipeline (Dock 3 only), or gravity drained to a sump when vessel elevations prevent gravity draining the dock line/hose into the vessel.
- B. The loading line/hose may be disconnected from the shore and/or marine vessel piping after the liquid has been removed from the loading line/hose. If it is necessary to empty the line/hose, any residual liquid in the line/hose shall be immediately drained directly into a sump. If the line/hose is not emptied, the open end(s) of the line/hose shall be immediately capped, plugged, or blinded to prevent leakage.
- C. After the loading line/hose has been removed from the vessel, the vapor return line shall be isolated and blinded to prevent leakage.

The actions shall be documented as part of the loading procedure.

- 29. The following requirements apply to transfers of product to pressurized trucks, including transfers of Liquefied Petroleum Gas (LPG).

Transfer racks shall be designed such that the total volume of components to be disconnected and vented to the atmosphere following transfer to any transport truck, including adapters, hoses, fittings, valves or couplings, does not exceed 650 cubic centimeters.

Control Devices

- 30. Each marine vapor combustor (EPNs VCU1 and VCU2) shall achieve 99.5% control of the VOC directed to it. The MSS vapor combustor (EPN MSSVCU) shall achieve 99% control of the VOC directed to it. This shall be ensured by maintaining the temperature in, or immediately downstream of, the combustion chamber above 1400 °F prior to the initial stack test performed in accordance with Special Condition 47. Following the completion of that stack test, the six minute average temperature shall be maintained above the minimum one hour average temperature maintained during the last satisfactory stack test.

The temperature measurement device shall reduce the temperature readings to an averaging period of 6 minutes or less and record it at that frequency. The temperature monitor shall be installed, calibrated or have a calibration check performed at least annually, and maintained according to the manufacturer's specifications. The device shall have an accuracy of the greater of ± 2 percent of the temperature being measured expressed in degrees Celsius or $\pm 2.5^{\circ}\text{C}$.

Quality assured (or valid) data must be generated when the VCU is operating except during the performance of a daily zero and span check. Loss of valid data due to periods of monitor break down, out-of-control operation (producing inaccurate data), repair, maintenance, or calibration may be exempted provided it does not exceed 5 percent of the

time (in minutes) that the VCU operated over the previous rolling 12 month period. The measurements missed shall be estimated using engineering judgment and the methods used recorded.

Each vapor combustor shall be operated with no visible emissions and have a constant pilot flame during all times waste gas could be directed to it. The pilot flame shall be continuously monitored by a thermocouple or an infrared monitor. The time, date, and duration of any loss of pilot flame shall be recorded. Each monitoring device shall be accurate to, and shall be calibrated or have a calibration check performed at a frequency in accordance with, the manufacturer's specifications.

31. The flare (EPN FL-1) shall be designed and operated in accordance with the following requirements.
 - A. The flare systems shall be designed such that the combined assist natural gas and waste stream to each flare meets the 40 CFR § 60.18 specifications of minimum heating value and maximum tip velocity at all times when emissions may be vented to them.
 - B. The heating value and velocity requirements shall be satisfied during operations authorized by this permit. Flare testing per 40 CFR § 60.18(f) may be requested by the appropriate regional office to demonstrate compliance with these requirements.
 - C. The flare shall be operated with a flame present at all times and/or have a constant pilot flame. The pilot flame shall be continuously monitored by a thermocouple, infrared monitor, or ultraviolet monitor. The time, date, and duration of any loss of pilot flame shall be recorded. Each monitoring device shall be accurate to, and shall be calibrated or have a calibration check performed at a frequency in accordance with, the manufacturer's specifications.
 - D. The flare shall be operated with no visible emissions except periods not to exceed a total of five minutes during any two consecutive hours. This shall be ensured by the use of air assist to the flare.
 - E. The permit holder shall apply with one of the following options for monitoring compliance with the requirements of Paragraph A of this condition. Additional monitoring options may be added to this paragraph on submission and approval of a permit alteration.
 - (1) The permit holder shall install a continuous flow monitor and composition analyzer that provides a record of the vent stream flow and composition (total VOC or Btu content) to the flare. The flow monitor sensor and analyzer sample points shall be installed in the vent stream as near as possible to the flare inlet such that the total vent stream to the flare is measured and analyzed. Readings shall be taken at least once every 15 minutes and the average hourly values of the flow and composition shall be recorded each hour.

The monitors shall be calibrated or have a calibration check performed on an annual basis to meet the following accuracy specifications: the flow monitor

shall be $\pm 5.0\%$, temperature monitor shall be $\pm 2.0\%$ at absolute temperature, and pressure monitor shall be ± 5.0 mm Hg;

Calibration of the analyzer shall follow the procedures and requirements of Section 10.0 of 40 CFR Part 60, Appendix B, Performance Specification 9, as amended through October 17, 2000 (65 FR 61744), except that the multi-point calibration procedure in Section 10.1 of Performance Specification 9 shall be performed at least once every calendar quarter instead of once every month, and the mid-level calibration check procedure in Section 10.2 of Performance Specification 9 shall be performed at least once every calendar week instead of once every 24 hours. The calibration gases used for calibration procedures shall be in accordance with Section 7.1 of Performance Specification 9. Net heating value of the gas combusted in the flare shall be calculated according to the equation given in 40 CFR §60.18(f)(3) as amended through October 17, 2000 (65 FR 61744).

The monitors and analyzers shall operate as required by this section at least 95% of the time when the flare is operational, averaged over a rolling 12 month period. Flared gas net heating value and actual exit velocity determined in accordance with 40 CFR §§60.18(f)(3) and 60.18(f)(4) shall be recorded at least once every hour. Hourly mass emission rates shall be determined and recorded using the above readings and the emission factors used in the permit application PI-1 dated May 6, 2013 (as updated).

- (2) The permit holder shall install a continuous flow monitor and calorimeter that provides a record of the vent stream flow and Btu content to the flare. The flow monitor sensor and analyzer sample points shall be installed in the vent stream as near as possible to the flare inlet such that the total vent stream to the flare is measured and analyzed. Readings shall be taken at least once every 15 minutes and the average hourly values of the flow and Btu content shall be recorded each hour.

The monitors shall be calibrated or have a calibration check performed on an annual basis to meet the following accuracy specifications: the flow monitor shall be $\pm 5.0\%$, temperature monitor shall be $\pm 2.0\%$ at absolute temperature, and pressure monitor shall be ± 5.0 mm Hg;

The calorimeter shall be calibrated, installed, operated, and maintained, in accordance with manufacturer recommendations, to continuously measure and record the net heating value of the gas sent to the flare, in British thermal units/standard cubic foot of the gas.

The monitors and analyzers shall operate as required by this section at least 95% of the time when the flare is operational, averaged over a rolling 12 month period. Flared gas net heating value and actual exit velocity determined in accordance with 40 CFR §§60.18(f)(3) and 60.18(f)(4) shall be recorded at least once every hour. Hourly mass emission rates shall be determined and recorded using the above readings and the emission factors used in the permit application PI-1 dated March 17, 2014 (as updated).

Wastewater Systems

32. Process wastewater shall be immediately directed to a covered system. All lift stations, manholes, junction boxes, conveyances, and any other wastewater facilities shall be covered and all emissions routed to a vapor combustor (EPN MSSVCU) for control.
33. The daily wastewater flow into the wastewater treatment plant shall be monitored and recorded. The rolling 12 month wastewater flow shall be totaled on a monthly basis.
34. Wastewater flow rate shall be monitored at all times, and the average flow concentration shall be used to calculate total VOC loading to the MSSVCU from process wastewater. Total VOC loading to the MSS VCU shall not exceed 9.13 pounds VOC per hour. Total wastewater flow shall be determined from monitored wastewater flow rates.

Wastewater VOC concentration shall be determined following EPA Reference Method 25D (40 CFR Part 60, Appendix A).

Equipment Leaks

35. Piping, Valves, Connectors, Pumps, Agitators, and Compressors — 28VHP

Except as may be provided for in the special conditions of this permit, the following requirements apply to the above-referenced equipment:

- A. The requirements of paragraphs F and G shall not apply (1) where the Volatile Organic Compound (VOC) has an aggregate partial pressure or vapor pressure of less than 0.044 pounds per square inch, absolute (psia) at 68° F or (2) operating pressure is at least 5 kilopascals (0.725 psi) below ambient pressure. Equipment excluded from this condition shall be identified in a list or by one of the methods described below to be made readily available upon request.

The exempted components may be identified by one or more of the following methods:

- (1) piping and instrumentation diagram (PID);
 - (2) a written or electronic database or electronic file;
 - (3) color coding;
 - (4) a form of weatherproof identification; or
 - (5) designation of exempted process unit boundaries.
- B. Construction of new and reworked piping, valves, pump systems, and compressor systems shall conform to applicable American National Standards Institute (ANSI), American Petroleum Institute (API), American Society of Mechanical Engineers (ASME), or equivalent codes.

- C. New and reworked underground process pipelines shall contain no buried valves such that fugitive emission monitoring is rendered impractical. New and reworked buried connectors shall be welded.
- D. To the extent that good engineering practice will permit, new and reworked valves and piping connections shall be so located to be reasonably accessible for leak-checking during plant operation. Difficult-to-monitor and unsafe-to-monitor valves, as defined by Title 30 Texas Administrative Code Chapter 115 (30 TAC Chapter 115), shall be identified in a list to be made readily available upon request. The difficult-to-monitor and unsafe-to-monitor valves may be identified by one or more of the methods described in subparagraph A above. If an unsafe to monitor component is not considered safe to monitor within a calendar year, then it shall be monitored as soon as possible during safe to monitor times. A difficult to monitor component for which quarterly monitoring is specified may instead be monitored annually.
- E. New and reworked piping connections shall be welded or flanged. Screwed connections are permissible only on piping smaller than two-inch diameter. Gas or hydraulic testing of the new and reworked piping connections at no less than operating pressure shall be performed prior to returning the components to service or they shall be monitored for leaks using an approved gas analyzer within 15 days of the components being returned to service. Adjustments shall be made as necessary to obtain leak-free performance. Connectors shall be inspected by visual, audible, and/or olfactory means at least weekly by operating personnel walk-through.

Each open-ended valve or line shall be equipped with an appropriately sized cap, blind flange, plug, or a second valve to seal the line. Except during sampling, both valves shall be closed. If the isolation of equipment for hot work or the removal of a component for repair or replacement results in an open ended line or valve, it is exempt from the requirement to install a cap, blind flange, plug, or second valve for 72 hours. If the repair or replacement is not completed within 72 hours, the permit holder must complete either of the following actions within that time period;

- (1) a cap, blind flange, plug, or second valve must be installed on the line or valve;
or
 - (2) the open-ended valve or line shall be monitored once for leaks above background for a plant or unit turnaround lasting up to 45 days with an approved gas analyzer and the results recorded. For all other situations, the open-ended valve or line shall be monitored once within the 72 hour period following the creation of the open ended line and monthly thereafter with an approved gas analyzer and the results recorded. For turnarounds and all other situations, leaks are indicated by readings of 500 ppmv and must be repaired within 24 hours or a cap, blind flange, plug, or second valve must be installed on the line or valve.
- F. Accessible valves shall be monitored by leak checking for fugitive emissions at least quarterly using an approved gas analyzer. Sealless/leakless valves (including, but not limited to, welded bonnet bellows and diaphragm valves) and relief valves equipped with a rupture disc upstream or venting to a control device are not required to be monitored. If a relief valve is equipped with rupture disc, a pressure-sensing

device shall be installed between the relief valve and rupture disc to monitor disc integrity.

A check of the reading of the pressure-sensing device to verify disc integrity shall be performed at least quarterly and recorded in the unit log or equivalent. Pressure-sensing devices that are continuously monitored with alarms are exempt from recordkeeping requirements specified in this paragraph. All leaking discs shall be replaced at the earliest opportunity but no later than the next process shutdown.

The gas analyzer shall conform to requirements listed in Method 21 of 40 CFR part 60, appendix A. The gas analyzer shall be calibrated with methane. In addition, the response factor of the instrument for a specific VOC of interest shall be determined and meet the requirements of Section 8 of Method 21. If a mixture of VOCs is being monitored, the response factor shall be calculated for the average composition of the process fluid. A calculated average is not required when all of the compounds in the mixture have a response factor less than 10 using methane. If a response factor less than 10 cannot be achieved using methane, then the instrument may be calibrated with one of the VOC to be measured or any other VOC so long as the instrument has a response factor of less than 10 for each of the VOC to be measured.

Replacements for leaking components shall be re-monitored within 15 days of being placed back into VOC service.

- G. Except as may be provided for in the special conditions of this permit, all pump, compressor, and agitator seals shall be monitored with an approved gas analyzer at least quarterly or be equipped with a shaft sealing system that prevents or detects emissions of VOC from the seal. Seal systems designed and operated to prevent emissions or seals equipped with an automatic seal failure detection and alarm system need not be monitored. These seal systems may include (but are not limited to) dual pump seals with barrier fluid at higher pressure than process pressure, seals degassing to vent control systems kept in good working order, or seals equipped with an automatic seal failure detection and alarm system. Submerged pumps or sealless pumps (including, but not limited to, diaphragm, canned, or magnetic-driven pumps) may be used to satisfy the requirements of this condition and need not be monitored.
- H. Damaged or leaking valves or connectors found to be emitting VOC in excess of 500 parts per million by volume (ppmv) or found by visual inspection to be leaking (e.g., dripping process fluids) shall be tagged and replaced or repaired. Damaged or leaking pump, compressor, and agitator seals found to be emitting VOC in excess of 2,000 ppmv or found by visual inspection to be leaking (e.g., dripping process fluids) shall be tagged and replaced or repaired. A first attempt to repair the leak must be made within 5 days and a record of the attempt shall be maintained.
- I. A leaking component shall be repaired as soon as practicable, but no later than 15 days after the leak is found. If the repair of a component would require a unit shutdown that would create more emissions than the repair would eliminate, the repair may be delayed until the next scheduled shutdown. All leaking components which cannot be repaired until a scheduled shutdown shall be identified for such repair by tagging within 15 days of the detection of the leak. A listing of all

components that qualify for delay of repair shall be maintained on a delay of repair list. The cumulative daily emissions from all components on the delay of repair list shall be estimated by multiplying by 24 the mass emission rate for each component calculated in accordance with the instructions in 30 TAC 115.782 (c)(1)(B)(i)(II). The calculations of the cumulative daily emissions from all components on the delay of repair list shall be updated within ten days of when the latest leaking component is added to the delay of repair list. When the cumulative daily emission rate of all components on the delay of repair list times the number of days until the next scheduled unit shutdown is equal to or exceeds the total emissions from a unit shutdown as calculated in accordance with 30 TAC 115.782 (c)(1)(B)(i)(I), the TCEQ Regional Manager and any local programs shall be notified and may require early unit shutdown or other appropriate action based on the number and severity of tagged leaks awaiting shutdown. This notification shall be made within 15 days of making this determination.

- J. Records of repairs shall include date of repairs, repair results, justification for delay of repairs, and corrective actions taken for all components. Records of instrument monitoring shall indicate dates and times, test methods, and instrument readings. The instrument monitoring record shall include the time that monitoring took place for no less than 95% of the instrument readings recorded. Records of physical inspections shall be noted in the operator's log or equivalent.
- K. Alternative monitoring frequency schedules of 30 TAC §§ 115.352 – 115.359 or National Emission Standards for Organic Hazardous Air Pollutants, 40 CFR Part 63, Subpart H, may be used in lieu of Items F through G of this condition.
- L. Compliance with the requirements of this condition does not assure compliance with requirements of 30 TAC Chapter 115, an applicable New Source Performance Standard (NSPS), or an applicable National Emission Standard for Hazardous Air Pollutants (NESHAPS) and does not constitute approval of alternative standards for these regulations.

36. Piping, Valves, Pumps, and Compressors in Ammonia (NH₃) Service

- A. Audio, olfactory, and visual checks for NH₃ leaks within the operating area shall be made once per shift.
- B. Immediately, but no later than one hour upon detection of a leak, plant personnel shall take the following actions:
 - (1) Isolate the leak.
 - (2) Commence repair or replacement of the leaking component.
 - (3) Use a leak collection/containment system to prevent the leak until repair or replacement can be made if immediate repair is not possible.
- C. Date and time of each inspection shall be noted in the operator's log or equivalent. Records shall be maintained at the plant site of all repairs and replacements made due to leaks. These records shall be made available to representatives of the Texas Commission on Environmental Quality (TCEQ) upon request.

Planned Maintenance, Startup and Shutdown (MSS)

37. This permit authorizes the emissions from the facilities authorized by this permit for the planned maintenance, startup, and shutdown (MSS) activities summarized in the table at Paragraph A.

This permit authorizes emissions from the following temporary facilities used to support planned MSS activities at permanent site facilities: frac tanks, containers, vacuum trucks, portable control devices identified in Special Condition 46, and controlled recovery systems. Emissions from temporary facilities are authorized provided the temporary facility (a) does not remain on the plant site for more than 12 consecutive months, (b) is used solely to support planned MSS activities at the permanent site facilities listed in this Attachment, and (c) does not operate as a replacement for an existing authorized facility.

A. MSS Activity Summary.

Facility	Activity	EPN
Storage Tanks	Operate tank with landed roof vented to control	MSSVCU
Storage Tanks	Tank with landed roof vented to atmosphere	TKLAND-ATM
Storage Tanks	Drain, degas to atmosphere, and open tank	TKLAND-ATM
Storage Tanks	Degas tank system to control	MSSVCU
Storage Tanks	Refill empty tank with landed roof	MSSVCU
Piping	Empty and degas to control	MSSVCU
Piping	Degas to atmosphere	VPIPEMSS
Piping	Drain liquid	VPIPEMSS
Air movers and vacuum trucks	Drain liquid from tanks for planned maintenance	VTRUCK
Frac Tanks	Operate frac tank or similar temporary tank/vessel	FRTANK
LPG Trucks	Degas to control, open truck for cleaning and maintenance	PTKMSS, MSSVCU
	Product Sampling	SAMPLE
See Paragraph B	Isolate, drain, degas to atmosphere, and refill to support planned maintenance	VPIPEMSS
See Paragraph C	Miscellaneous low emitting activities	VPIPEMSS

B. Routine Maintenance Activities

Pump repair/replacement

Fugitive component (valve, pipe, flange) repair/replacement

Compressor repair/replacement

- Heat exchanger repair/replacement
- Vessel repair/replacement
- C. Miscellaneous Low Emitting Activities
 - Meter proving
 - Adhesives application
 - Sample collection
 - Cold solvent degreaser
 - Use and Disposal of Aerosol Products
 - Calibration/Inspection/Repair /Replacement of Analytical Equipment and CEMS
 - Inspection/ Cleaning/Repair/Replacement of Screens/Filters
 - Opening/Cleaning/Inspection/Repair /Replacement of gauges and sight glasses
 - Calibration/Inspection/Repair /Replacement of Process Instruments
 - Inspection/ Cleaning/Fluid
 - Addition/Repair /Replacement of Lube Oil Systems
 - Tank Seal Gap Measurements
 - Water Washing Empty Drums and Additive Totes and miscellaneous small equipment
 - Inspection/ Cleaning/Repair/Replacement of equipment in heavy-liquid service
- 38. Special Condition 37.C identifies the inherently low emitting MSS activities that may be performed at the plant. Emissions from activities identified in Special Condition 37.C shall be considered to be equal to the potential to emit represented in the permit application. The estimated emissions from the activities listed in Special Condition 37.C must be revalidated annually. This revalidation shall consist of the estimated emissions for each type of activity and the basis for that emission estimate.

Routine maintenance activities, as identified in Special Condition 37.B may be tracked through the work orders or equivalent. Emissions from activities identified in Special Condition 37.B shall be calculated using the number of work orders or equivalent that month and the emissions associated with that activity identified in the permit application.

The performance of each planned MSS activity not identified in Special Condition 37.B or 37.C and the emissions associated with it shall be recorded and include at least the following information:

 - A. the process unit at which emissions from the MSS activity occurred, including the emission point number and common name of the process unit;
 - B. the type of planned MSS activity and the reason for the planned activity;

- C. the common name and the facility identification number, if applicable, of the facilities at which the MSS activity and emissions occurred;
- D. the date and time of the MSS activity and its duration;
- E. the estimated quantity of each air contaminant, or mixture of air contaminants, emitted with the data and methods used to determine it. The emissions shall be estimated using the methods identified in the permit application, consistent with good engineering practice.

All MSS emissions shall be summed monthly and the rolling 12-month emissions shall be updated on a monthly basis.

39. Process units and facilities, with the exception of those identified in Special Conditions 41, 42, 44, and Special Condition 37.C shall be depressurized, emptied, degassed, and placed in service in accordance with the following requirements.
- A. The process equipment shall be depressurized to a control device or a controlled recovery system prior to venting to atmosphere, degassing, or draining liquid. Equipment that only contains material that is liquid with VOC partial pressure less than 0.50 psi at the normal process temperature and 95°F may be opened to atmosphere and drained in accordance with paragraph C of this special condition. The vapor pressure at 95°F may be used if the actual temperature of the liquid is verified to be less than 95°F and the temperature is recorded.
 - B. If mixed phase materials must be removed from process equipment, the cleared material shall be routed to a knockout drum or equivalent to allow for managed initial phase separation. If the VOC partial pressure is greater than 0.50 psi at either the normal process temperature or 95°F, any vents in the system must be routed to a control device or a controlled recovery system. The vapor pressure at 95°F may be used if the actual temperature of the liquid is verified to be less than 95°F and the temperature is recorded. Control must remain in place until degassing has been completed following paragraph D or the system is no longer vented to atmosphere.
 - C. All liquids from process equipment or storage vessels must be removed to the maximum extent practical prior to opening equipment to commence degassing and/or maintenance. Liquids must be drained into a closed vessel or closed liquid recovery system unless prevented by the physical configuration of the equipment. If it is necessary to drain liquid into an open pan or sump, the liquid must be covered or transferred to a covered vessel within one hour of being drained.
 - D. If the VOC partial pressure is greater than 0.50 psi at the normal process temperature or 95°F, facilities shall be degassed using good engineering practice to ensure air contaminants are removed from the system through the control device or controlled recovery system to the extent allowed by process equipment or storage vessel design. The vapor pressure at 95°F may be used if the actual temperature of the liquid is verified to be less than 95°F and the temperature is recorded. The facilities to be degassed shall not be vented directly to atmosphere, except as necessary to establish isolation of the work area or to monitor VOC concentration

following controlled depressurization. The venting shall be minimized to the maximum extent practicable and actions taken recorded. The control device or recovery system utilized shall be recorded with the estimated emissions from controlled and uncontrolled degassing calculated using the methods that were used to determine allowable emissions for the permit application.

- (1) For MSS activities identified in Special Condition 37.B, the following option may be used in lieu of (2) below. The facilities being prepared for maintenance shall not be vented directly to atmosphere until the VOC concentration has been verified to be less than 10 percent of the lower explosive limit (LEL) per the site safety procedures.
- (2) The locations and/or identifiers where the purge gas or steam enters the process equipment or storage vessel and the exit points for the exhaust gases shall be recorded (process flow diagrams [PFDs] or piping and instrumentation diagrams [P&IDs] may be used to demonstrate compliance with the requirement). If the process equipment is purged with a gas, two system volumes of purge gas must have passed through the control device or controlled recovery system before the vent stream may be sampled to verify acceptable VOC concentration prior to uncontrolled venting. The VOC sampling and analysis shall be performed using an instrument meeting the requirements of Special Condition 40. The sampling point shall be upstream of the inlet to the control device or controlled recovery system. The sample ports and the collection system must be designed and operated such that there is no air leakage into the sample probe or the collection system downstream of the process equipment or vessel being purged. If there is not a connection (such as a sample, vent, or drain valve) available from which a representative sample may be obtained, a sample may be taken upon entry into the system after degassing has been completed. The sample shall be taken from inside the vessel so as to minimize any air or dilution from the entry point. The facilities shall be degassed to a control device or controlled recovery system until the VOC concentration is less than 10,000 ppmv or 10 percent of the LEL. Documented site procedures used to de-inventory equipment to a control device for safety purposes (i.e., hot work or vessel entry procedures) that achieve at least the same level of purging may be used in lieu of the above.

E. Gases and vapors with VOC partial pressure greater than 0.50 psi may be vented directly to atmosphere if all the following criteria are met:

- (1) It is not technically practicable to depressurize or degas, as applicable, into the process.
- (2) There is not an available connection to a plant control system (flare).
- (3) There is no more than 50 lb of air contaminant to be vented to atmosphere during shutdown or startup, as applicable.

All instances of venting directly to atmosphere per Paragraph E must be documented when occurring as part of any MSS activity. The emissions associated with venting

without control must be included in the work order or equivalent for those planned MSS activities identified in Special Condition 37.B.

40. Air contaminant concentration shall be measured using an instrument/detector meeting one set of requirements specified below.

A. VOC concentration shall be measured using an instrument meeting all the requirements specified in EPA Method 21 (40 CFR 60, Appendix A) with the following exceptions:

- (1) The instrument shall be calibrated within 24 hours of use with a calibration gas such that the response factor (RF) of the VOC (or mixture of VOCs) to be monitored shall be less than 2.0. The calibration gas and the gas to be measured, and its approximate (RF) shall be recorded. If the RF of the VOC (or mixture of VOCs) to be monitored is greater than 2.0, the VOC concentration shall be determined as follows:

$$\text{VOC Concentration} = \text{Concentration as read from the instrument} \times \text{RF}$$

In no case should a calibration gas be used such that the RF of the VOC (or mixture of VOCs) to be monitored is greater than 5.0.

- (2) Sampling shall be performed as directed by this permit in lieu of section 8.3 of Method 21. During sampling, data recording shall not begin until after two times the instrument response time. The date and time shall be recorded, and VOC concentration shall be monitored for at least 5 minutes, recording VOC concentration each minute. As an alternative the VOC concentration may be monitored over a five-minute period with an instrument designed to continuously measure concentration and record the highest concentration read. The highest measured VOC concentration shall be recorded and shall not exceed the specified VOC concentration limit prior to uncontrolled venting.

B. Colorimetric gas detector tubes may be used to determine air contaminant concentrations if they are used in accordance with the following requirements.

- (1) The air contaminant concentration measured as defined in (3) is less than 80 percent of the range of the tube and is at least 20 percent of the maximum range of the tube.
- (2) The tube is used in accordance with the manufacturer's guidelines.
- (3) At least 2 samples taken at least 5 minutes apart must satisfy the following prior to uncontrolled venting:

$$\text{measured contaminant concentration (ppmv)} < \text{release concentration.}$$

Where the release concentration is:

$$10,000 \times \text{mole fraction of the total air contaminants present that can be detected by the tube.}$$

The mole fraction may be estimated based on process knowledge. The release concentration and basis for its determination shall be recorded.

Records shall be maintained of the tube type, range, measured concentrations, and time the samples were taken.

- C. Lower explosive limit measured with a lower explosive limit detector.
 - (1) The detector shall be calibrated within 30 days of use with a certified pentane gas standard at 25% of the lower explosive limit (LEL) for pentane. Records of the calibration date/time and calibration result (pass/fail) shall be maintained.
 - (2) A functionality test shall be performed on each detector within 24 hours of use with a certified gas standard at 25% of the LEL for pentane. The LEL monitor shall read no lower than 90% of the calibration gas certified value. Records, including the date/time and test results, shall be maintained.
 - (3) A certified methane gas standard equivalent to 25% of the LEL for pentane may be used for calibration and functionality tests provided that the LEL response is within 95% of that for pentane.
- 41. This permit authorizes emissions from EPNs TKLAND-ATM and MSSVCU for the floating roof storage tanks identified in Special Condition 12 during planned floating roof landings. Tank roofs may only be landed for changes of tank service or tank inspection/maintenance as identified in the permit application. Tank roof landings include all operations when the tank floating roof is on its supporting legs. These emissions are subject to the maximum allowable emission rates indicated on the MAERT.

The following requirements apply to tank roof landings.

- A. If the VOC partial pressure of the liquid stored in the tank is greater than 0.50 psia at 95° F, a vapor recovery system shall be connected to the vapor space under the landed tank roof and the vapor space vented to the MSS VCU (EPN MSSVCU). The locations and identifiers of vents on the floating roof other than permanent roof fittings and seals, control device or controlled recovery system, and controlled exhaust stream shall be recorded. There shall be no other gas/vapor flow out of the vapor space under the floating roof when the vapor space is directed to the control device. The vapor space shall be vented to the control device during the period from the first stoppage of liquid withdrawal after the roof is landed until the VOC concentration in the tank per paragraph D has been verified or the tank has been filled so that the landed roof is floating on liquid. The vapor recovery system collection rate shall always be greater than 100 cubic feet per minute when the tank is idle and two times the fill rate when the tank is being refilled.
- B. The tank liquid level shall be continuously lowered after the tank floating roof initially lands on its supporting legs until the tank has been drained to the maximum extent practicable without entering the tank. Liquid level may be maintained steady for a period of up to two hours if necessary to allow for valve lineups and pump changes necessary to drain the tank. This requirement does not apply where the vapor under a floating roof is routed to control or a controlled recovery system during this process.
- C. The tank roof shall be landed on its lowest legs unless tank entry is planned.

- D. Floating roof tanks with liquid capacities less than 100,000 gallons (2,381 Bbl) may be degassed without control if the VOC partial pressure of the standing liquid in the tank has been reduced to less than 0.02 psia prior to ventilating the tank. Controlled degassing of the vapor space under landed roofs shall be completed as follows:
- (1) Any gas or vapor removed from the vapor space under the floating roof must be routed to a control device or a controlled recovery system and controlled degassing must be maintained until the VOC concentration is less than 10,000 ppmv or 10 percent of the LEL.
 - (2) The vapor space under the floating roof shall be vented using good engineering practice to ensure air contaminants are flushed out of the tank through the control device or controlled recovery system to the extent allowed by the storage tank design.
 - (3) A volume of purge gas equivalent to twice the volume of the vapor space under the floating roof must have passed through the control device or into a controlled recovery system, before the vent stream may be sampled to verify acceptable VOC concentration. The measurement of purge gas volume shall not include any make-up air introduced into the control device or recovery system. The VOC sampling and analysis shall be performed as specified in Special Condition 43.
 - (4) The sampling point shall be upstream of the inlet to the control device or controlled recovery system. The sample ports and the collection system must be designed and operated such that there is no air leakage into the sample probe or the collection system downstream of the process equipment or vessel being purged.
 - (5) Degassing must be performed every 24 hours unless there is no standing liquid in the tank or the VOC partial pressure of the remaining liquid in the tank is less than 0.15 psia.
- E. The tank shall not be opened or ventilated without control, except as allowed by (1) below until one of the criteria in paragraph F of this condition is satisfied.
- (1) Minimize air circulation in the tank vapor space.
 - (a) One manway may be opened to allow access to the tank to remove or de-volatilize the remaining liquid. Other manways or access points may be opened as necessary to remove or de-volatilize the remaining liquid. Wind barriers shall be installed at all open manways and access points to minimize air flow through the tank.
 - (b) Access points shall be closed when not in use.
- F. The tank may be opened without restriction and ventilated without control, after all standing liquid has been removed from the tank or the liquid remaining in the tank has a VOC partial pressure less than 0.02 psia. These criteria shall be demonstrated in any one of the following ways.

- (1) Low VOC partial pressure liquid that is soluble with the liquid previously stored may be added to the tank to lower the VOC partial pressure of the liquid mixture remaining in the tank to less than 0.02 psia. This liquid shall be added during tank degassing if practicable. The estimated volume of liquid remaining in the drained tank and the volume and type of liquid added shall be recorded. The liquid VOC partial pressure may be estimated based on this information and engineering calculations.
 - (2) If water is added or sprayed into the tank to remove standing VOC, one of the following must be demonstrated:
 - (a) Take a representative sample of the liquid remaining in the tank and verify no visible sheen using the static sheen test from 40 CFR Part 435 Subpart A Appendix 1.
 - (b) Take a representative sample of the liquid remaining in the tank and verify hexane soluble VOC concentration is less than 1000 ppmw using EPA method 1664 (may also use 8260B or 5030 with 8015 from SW-846).
 - (c) Stop ventilation and close the tank for at least 24 hours. When the tank manway is opened after this period, verify VOC concentration is less than 1000 ppmv through the procedure in Special Condition 40.
 - (d) No standing liquid verified through visual inspection. The permit holder shall maintain records to document the method used to release the tank.
- G. The combined fill rates of all tanks with a landed floating roof shall not exceed 20,000 Bbl/hr. If control is not required under paragraph A, the tanks shall be refilled as rapidly as practicable until the roof is off its legs.
- H. The occurrence of each roof landing and the associated emissions shall be recorded and the rolling 12-month tank roof landing emissions shall be updated on a monthly basis. These records shall include at least the following information:
- (1) the identification of the tank and emission point number, and any control devices or recovery systems used to reduce emissions; (2) the reason for the tank roof landing;
 - (2) for the purpose of estimating emissions, the date, time, and other information specified for each of the following events:
 - (a) the roof was initially landed,
 - (b) all liquid was pumped from the tank to the extent practical,
 - (c) start and completion of controlled degassing, and total volumetric flow,
 - (d) all standing liquid was removed from the tank or any transfers of low VOC partial pressure liquid to or from the tank including volumes and vapor pressures to reduce tank liquid VOC partial pressure to less than 0.02 psi,

- (e) if there is liquid in the tank, VOC partial pressure of liquid, start and completion of uncontrolled degassing, and total volumetric flow,
 - (f) refilling commenced, liquid filling the tank, and the volume necessary to float the roof; and
 - (g) tank roof off supporting legs, floating on liquid;
 - (3) the estimated quantity of each air contaminant, or mixture of air contaminants, emitted between events c and g with the data and methods used to determine it. The emissions associated with roof landing activities shall be calculated using the methods described in Section 7.1.3.2 of AP-42 "Compilation of Air Pollution Emission Factors, Chapter 7 - Storage of Organic Liquids" dated November 2006 and the permit application.
42. Fixed roof storage tanks are subject to the requirements of Special Condition 41.E and 41.F. If the ventilation of the vapor space is controlled, the emission control system shall meet the requirements of Special Condition 41.D(1) through 41.D(4). Records shall be maintained per Special Condition 41.H(2)(c) through 41.H(2)(e), and 41.H(3).
43. The following requirements apply to vacuum and air mover truck operations to support planned MSS at this site:
- A. Prior to initial use, identify any liquid in the truck. Record the liquid level and document the VOC partial pressure. After each liquid transfer, identify the liquid, the volume transferred, and its VOC partial pressure.
 - B. If vacuum pumps or blowers are operated when liquid is in or being transferred to the truck, the following requirements apply:
 - (1) If the VOC partial pressure of the liquid in or being transferred to the truck is greater than 0.50 psi at 95°F, the vacuum/blower exhaust shall be routed to a control device or a controlled recovery system.
 - (2) Equip fill line intake with a "duckbill" or equivalent attachment if the hose end cannot be submerged in the liquid being collected.
 - (3) A daily record containing the information identified below is required for each vacuum truck in operation at the site each day.
 - (a) For each liquid transfer made with the vacuum operating, record the duration of any periods when air may have been entrained with the liquid transfer. The reason for operating in this manner and whether a "duckbill" or equivalent was used shall be recorded. Short, incidental periods, such as those necessary to walk from the truck to the fill line intake, do not need to be documented.
 - (b) If the vacuum truck exhaust is controlled with a control device other than an engine or oxidizer, VOC exhaust concentration upon commencing each transfer, at the end of each transfer, and at least every hour during each

transfer shall be recorded, measured using an instrument meeting the requirements of Special Condition 40.A or 40.B.

- C. Record the volume in the vacuum truck at the end of the day, or the volume unloaded, as applicable.
 - D. The permit holder shall determine the vacuum truck emissions each month using the daily vacuum truck records and the calculation methods utilized in the permit application. If records of the volume of liquid transferred for each pick-up are not maintained, the emissions shall be determined using the physical properties of the liquid vacuumed with the greatest potential emissions. Rolling 12 month vacuum truck emissions shall also be determined on a monthly basis.
 - E. If the VOC partial pressure of all the liquids vacuumed into the truck is less than 0.10 psi, this shall be recorded when the truck is unloaded or leaves the plant site and the emissions may be estimated as the maximum potential to emit for a truck in that service as documented in the permit application. The recordkeeping requirements in Paragraphs A through D do not apply.
44. The following requirements apply to frac, or temporary, tanks and vessels used in support of MSS activities.
- A. The exterior surfaces of these tanks/vessels that are exposed to the sun shall be white or aluminum. This requirement does not apply to tanks/vessels that only vent to atmosphere when being filled, sampled, gauged, or when removing material.
 - B. These tanks/vessels must be covered and equipped with fill pipes that discharge within 6 inches of the tank/vessel bottom.
 - C. These requirements do not apply to vessels storing less than 450 gallons of liquid that are closed such that the vessel does not vent to atmosphere except when filling, sampling, gauging, or when removing material.
 - D. The permit holder shall maintain an emissions record which includes calculated emissions of VOC from all frac tanks during the previous calendar month and the past consecutive 12 month period. This record must be updated by the last day of the month following. The record shall include tank identification number, dates put into and removed from service, control method used, tank capacity and volume of liquid stored in gallons, name of the material stored, VOC molecular weight, and VOC partial pressure at the estimated monthly average material temperature in psia. Filling emissions for tanks shall be calculated using the TCEQ publication titled "Technical Guidance Package for Chemical Sources - Loading Operations" and standing emissions determined using: the TCEQ publication titled "Technical Guidance Package for Chemical Sources - Storage Tanks."
 - E. If the tank/vessel is used to store liquid with VOC partial pressure less than 0.10 psi at 95°F, records may be limited to the days the tank is in service and the liquid stored. Emissions may be estimated based upon the potential to emit as identified in the permit application.

45. Additional occurrences of MSS activities authorized by this permit may be authorized under permit by rule only if conducted in compliance with this permit's procedures, emission controls, monitoring, and recordkeeping requirements applicable to the activity.
46. Control devices required by this permit for emissions from planned MSS activities are limited to those types identified in this condition. Control devices shall be operated with no visible emissions except periods not to exceed a total of five minutes during any two consecutive hours. Each device used must meet all the requirements identified for that type of control device.

Controlled recovery systems identified in this permit shall be directed to an operating process or to a collection system that is vented through a control device meeting the requirements of this permit condition.

Initial Demonstration of Compliance

47. The permit holder shall perform stack sampling and other testing as required to establish the actual pattern and quantities of air contaminants being emitted into the atmosphere from the VCU's (EPNs MSSVCU, VCU1 and VCU2) and from the splitter heaters (EPNs H-1A, H-1B, H-2A, H-2B) to demonstrate compliance with Special Conditions 1, 30, and 17. The permit holder is responsible for providing sampling and testing facilities and conducting the sampling and testing operations at his expense. Sampling shall be conducted in accordance with the appropriate procedures of the Texas Commission on Environmental Quality (TCEQ) Sampling Procedures Manual and the U.S. Environmental Protection Agency (EPA) Reference Methods.

Requests to waive testing for any pollutant specified in this condition shall be submitted to the TCEQ Office of Air, Air Permits Division. Test waivers and alternate/equivalent procedure proposals for Title 40 Code of Federal Regulation Part 60 (40 CFR Part 60) testing which must have EPA approval shall be submitted to the TCEQ Regional Director.

- A. The appropriate TCEQ Regional Office shall be notified not less than 45 days prior to sampling. The notice shall include:
 - (1) Proposed date for pretest meeting.
 - (2) Date sampling will occur.
 - (3) Name of firm conducting sampling.
 - (4) Type of sampling equipment to be used.
 - (5) Method or procedure to be used in sampling.
 - (6) Description of any proposed deviation from the sampling procedures specified in this permit or TCEQ/EPA sampling procedures.
 - (7) Procedure/parameters to be used to determine worst case emissions (such as production rate, temperature for incinerators, etc. These set operating

parameters to be monitored and operating limits in other permit conditions) during the sampling period.

The purpose of the pretest meeting is to review the necessary sampling and testing procedures, to provide the proper data forms for recording pertinent data, and to review the format procedures for the test reports. The TCEQ Regional Director must approve any deviation from specified sampling procedures.

- B. Air contaminants emitted from the VCUs (EPNs MSSVCU, VCU1 and VCU2) to be tested for include (but are not limited to) VOC, NO_x, and CO. Air contaminants emitted from the Heaters (EPNs H-1A, H-1B, H-2A, H-2B) to be tested for include (but are not limited to) NO_x, CO, PM_{2.5} (condensable and filterable) and NH₃.
- C. Sampling of the MSS VCU (EPN MSSVCU) and Heaters (EPNs H-1A, H-1B, H-2A, and H-2B) shall occur within 60 days of achieving the maximum operating rate, but no later than 180 days after startup of the facilities, and at such other times as may be required by the TCEQ Executive Director.

Sampling of the marine VCUs (EPNs VCU1 and VCU2) shall occur no later than 180 days after the first load out of products produced by the splitter, and at such other times as may be required by the TCEQ Executive Director.

Requests for additional time to perform sampling shall be submitted to the appropriate regional office.

- D. Operating parameters during sampling.
 - (1) For the marine loading vapor combustors (EPNs VCU1 and VCU2), sampling shall be conducted during loading of light naphtha or condensate at the maximum loading rate.
 - (2) For the process heaters (EPNs H-1A, H-1B, H-2A, H-2B), sampling shall be conducted at the maximum firing rate.
 - (3) For the MSS vapor combustor (EPN MSSVCU), sampling shall be conducted during refilling of a landed IFR tank in light naphtha or condensate service.

These conditions/parameters and any other primary operating parameters that affect the emission rate shall be monitored and recorded during the stack test. Any additional parameters shall be determined at the pretest meeting and shall be stated in the sampling report. Permit conditions and parameter limits may be waived during stack testing performed under this condition if the proposed condition/parameter range is identified in the test notice specified in paragraph A and accepted by the TCEQ Regional Office. Permit allowable emissions and emission control requirements are not waived and still apply during stack testing periods.

During subsequent operations, if the loading rate, firing rate, or filling rate (as applicable) is greater than that recorded during the test period, stack sampling shall be performed at the new operating conditions within 120 days. This sampling may be waived by the TCEQ Air Section Manager for the region.

- E. Copies of the final sampling report shall be forwarded to the offices below within 60 days after sampling is completed. Sampling reports shall comply with the attached provisions entitled "Chapter 14, Contents of Sampling Reports" of the TCEQ Sampling Procedures Manual. The reports shall be distributed as follows:
 - One copy to the appropriate TCEQ Regional Office.
 - One copy to each local air pollution control program.
- F. Sampling ports and platform(s) shall be incorporated into the design of each heater stack and each control device stack according to the specifications set forth in the attachment entitled "Chapter 2, Stack Sampling Facilities" of the Texas Commission on Environmental Quality (TCEQ) Sampling Procedures Manual. Alternate sampling facility designs must be submitted for approval to the TCEQ Regional Director.

Intermittent Sources

- 48. Each emergency generator and each emergency firewater pump (EPNs EMGEN1, EMGEN2, FWP1, and FWP2) is limited to no more than 100 hours per rolling 12 month period of non-emergency operation. Each generator or firewater pump must be equipped with a non-resettable runtime meter. Records of the hours of operation shall be maintained on site.

Date: April 10, 2015

Emission Sources — Maximum Allowable Emission Rates

Permit Numbers 118270 and PSDTX1398

This table lists the maximum allowable emission rates and all sources of air contaminants on the applicant's property covered by this permit. The emission rates shown are those derived from information submitted as part of the application for permit and are the maximum rates allowed for these facilities, sources, and related activities. Any proposed increase in emission rates may require an application for a modification of the facilities covered by this permit.

Air Contaminants Data

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
H-1A	Fractionator Heater H-1A	VOC	0.70	2.77
		NO _x	1.29	3.08
		CO	4.77	18.98
		PM	0.58	2.31
		PM ₁₀	0.58	2.31
		PM _{2.5}	0.58	2.31
		SO ₂	2.28	4.95
		NH ₃	0.58	2.31
H-1B	Hot Oil Heater H-1B	VOC	0.57	2.27
		NO _x	1.06	2.53
		CO	3.91	15.58
		PM	0.48	1.90
		PM ₁₀	0.48	1.90
		PM _{2.5}	0.48	1.90
		SO ₂	1.87	4.07
		NH ₃	0.48	1.89

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
H-2A	Fractionator Heater H-2A	VOC	0.70	2.77
		NO _x	1.29	3.08
		CO	4.77	18.98
		PM	0.58	2.31
		PM ₁₀	0.58	2.31
		PM _{2.5}	0.58	2.31
		SO ₂	2.28	4.95
		NH ₃	0.58	2.31
H-2B	Hot Oil Heater H-2B	VOC	0.57	2.27
		NO _x	1.06	2.53
		CO	3.91	15.58
		PM	0.48	1.90
		PM ₁₀	0.48	1.90
		PM _{2.5}	0.48	1.90
		SO ₂	1.87	4.07
		NH ₃	0.48	1.89
H-3	Tank Heater 3	VOC	0.09	—
		NO _x	1.57	—
		CO	1.32	—
		PM	0.12	—
		PM ₁₀	0.12	—
		PM _{2.5}	0.12	—
		SO ₂	0.24	—

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
H-4	Tank Heater 4	VOC	0.09	—
		NO _x	0.58	—
		CO	0.59	—
		PM	0.12	—
		PM ₁₀	0.12	—
		PM _{2.5}	0.12	—
		SO ₂	0.24	—
H-3_H-4_CAP	Tank Heaters 3 & 4 Annual Emission Cap	VOC	—	0.38
		NO _x	—	4.71
		CO	—	4.18
		PM	—	0.53
		PM ₁₀	—	0.53
		PM _{2.5}	—	0.53
		SO ₂	—	1.03
FL-1	Flare	VOC	0.06	0.26
		NO _x	0.03	0.14
		CO	0.07	0.28
		SO ₂	<0.01	<0.01
FUG-1	Fugitives (5)	VOC	8.36	36.60
		H ₂ S	<0.01	0.01
		NH ₃	0.09	0.40
LOADFUG	Marine Loading Fugitives	VOC	165.07	82.88
		H ₂ S	0.06	0.03

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
VCU1	Marine Vapor Combustor 1	VOC	31.65	—
		NO _x	22.50	—
		CO	30.00	—
		PM	1.12	—
		PM ₁₀	1.12	—
		PM _{2.5}	1.12	—
		SO ₂	5.19	—
VCU2	Marine Vapor Combustor 2	VOC	31.65	—
		NO _x	22.50	—
		CO	30.00	—
		PM	1.12	—
		PM ₁₀	1.12	—
		PM _{2.5}	1.12	—
		SO ₂	5.19	—
VCU1/VCU2	Marine Vapor Combustors	VOC	—	10.59
		NO _x	—	12.35
		CO	—	16.46
		PM	—	0.61
		PM ₁₀	—	0.61
		PM _{2.5}	—	0.61
		SO ₂	—	2.01
PTRUCK	Pressurized Truck Loading	VOC	4.61	5.89
T120	Tank No. 120	VOC	2.62	5.09
		H ₂ S	<0.01	<0.01

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
T121	Tank No. 121	VOC	2.62	5.09
		H ₂ S	<0.01	<0.01
T122	Tank No. 122	VOC	2.62	5.09
		H ₂ S	<0.01	<0.01
T123	Tank No. 123	VOC	2.62	5.09
		H ₂ S	<0.01	<0.01
T124	Tank No. 124	VOC	2.62	5.09
		H ₂ S	<0.01	<0.01
T125	Tank No. 125	VOC	2.62	5.09
		H ₂ S	<0.01	<0.01
T126	Tank No. 126	VOC	52.36	15.78
		H ₂ S	0.02	0.01
T127	Tank No. 127	VOC	52.36	15.78
		H ₂ S	0.02	0.01
T128	Tank No. 128	VOC	52.36	15.78
		H ₂ S	0.02	0.01
T129	Tank No. 129	VOC	52.36	15.78
		H ₂ S	0.02	<0.01
T135	Tank No. 135	VOC	2.32	5.09
		H ₂ S	<0.01	<0.01
T136	Tank No. 136	VOC	2.32	5.09
		H ₂ S	<0.01	<0.01
T137	Tank No. 137	VOC	2.32	5.09
		H ₂ S	<0.01	<0.01
T138	Tank No. 138	VOC	2.32	5.09
		H ₂ S	<0.01	<0.01

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
T139	Tank No. 139	VOC	2.32	5.09
		H ₂ S	<0.01	<0.01
T154	Tank No. 154	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T155	Tank No. 155	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T156	Tank No. 156	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T157	Tank No. 157	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T158	Tank No. 158	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T159	Tank No. 159	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T160	Tank No. 160	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
T161	Tank No. 161	VOC	2.56	5.09
		H ₂ S	<0.01	<0.01
TANKCAP	Tank Cap (6)	VOC	—	84.77
		H ₂ S	—	0.03
SAMPTK	Product Sample Collection Tank	VOC	0.04	0.01
		H ₂ S	<0.01	<0.01
FWPTK	Fire Water Pump Fuel Tank	VOC	0.03	0.01
		H ₂ S	<0.01	<0.01
EMGENTK	Emergency Generator Fuel Tank	VOC	0.03	0.01
		H ₂ S	<0.01	<0.01

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
FWP1	Fire Water Pump	VOC	0.14	<0.01
		NO _x	3.54	0.18
		CO	0.68	0.03
		PM	0.12	<0.01
		PM ₁₀	0.12	<0.01
		PM _{2.5}	0.12	<0.01
		SO ₂	<0.01	<0.01
FWP2	Backup Fire Water Pump	VOC	0.14	<0.01
		NO _x	3.54	0.18
		CO	0.68	0.03
		PM	0.12	<0.01
		PM ₁₀	0.12	<0.01
		PM _{2.5}	0.12	<0.01
		SO ₂	<0.01	<0.01

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
EMGEN1	Emergency Generator 1	VOC	0.01	<0.01
		NO _x	8.48	0.42
		CO	0.59	0.03
		PM	0.03	<0.01
		PM ₁₀	0.03	<0.01
		PM _{2.5}	0.03	<0.01
		SO ₂	<0.01	<0.01
EMGEN2	Emergency Generator 2	VOC	0.34	0.02
		NO _x	0.82	0.04
		CO	0.25	0.01
		PM	0.05	<0.01
		PM ₁₀	0.05	<0.01
		PM _{2.5}	0.05	<0.01
		SO ₂	<0.01	<0.01
MSSVCU	MSS Vapor Combustor — Wastewater Treatment	VOC	0.09	0.40
		NO _x	0.03	0.12
		CO	0.05	0.22
		SO ₂	<0.01	0.03
		H ₂ S	<0.01	<0.01
PTKMSS	Pressurized Trucks MSS Activities	VOC	417.22	3.18
VTRUCK	Vacuum Trucks	VOC	1.65	0.10
		H ₂ S	<0.01	<0.01
FRTANK	Frac Tanks	VOC	155.70	0.17
		H ₂ S	0.06	<0.01

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
SAMPLE	Product Sampling	VOC	0.74	1.62
		H ₂ S	<0.01	<0.01
MSSVCU	MSS Vapor Combustor — Pressure Tank MSS	VOC	128.02	0.17
		NO _x	38.41	0.05
		CO	70.54	0.09
		PM	1.91	<0.01
		PM ₁₀	1.91	<0.01
		PM _{2.5}	1.91	<0.01
VPIPEMSS	Vessels & Piping MSS (Uncontrolled)	VOC	53.65	4.80
		H ₂ S	0.02	<0.01
FL-1	Vessels & Piping MSS (Controlled)	VOC	91.45	2.74
		H ₂ S	<0.01	<0.01
		NO _x	13.72	0.41
		CO	25.19	0.76
		SO ₂	0.04	<0.01
TKLAND-ATM	Uncontrolled Floating Roof Tank Landing Cap (7)	VOC	22.48	0.86
		H ₂ S	<0.01	<0.01

Emission Sources - Maximum Allowable Emission Rates

Emission Point No. (1)	Source Name (2)	Air Contaminant Name (3)	Emission Rates	
			lbs/hour	TPY (4)
MSSVCU	Controlled Floating Roof Tank Landing Cap (6)	VOC	101.37	1.93
		NO _x	9.74	0.35
		CO	17.89	0.64
		H ₂ S	0.04	<0.01
		PM	0.24	0.02
		PM ₁₀	0.24	0.02
		PM _{2.5}	0.24	0.02
		SO ₂	2.21	0.07
TKLAND-CAP	Overall Floating Roof Tank Landing Cap	VOC	101.37	2.79
		NO _x	9.74	0.35
		CO	17.89	0.64
		H ₂ S	0.04	<0.01
		PM	0.24	0.02
		PM ₁₀	0.24	0.02
		PM _{2.5}	0.24	0.02
		SO ₂	2.21	0.07
MSSVCU	MSS Vapor Combustion Unit Pilot/Assist Gas	NO _x	3.78	2.76
		CO	6.94	5.07
		VOC	0.14	0.10
		H ₂ S	<0.01	<0.01
		PM	0.19	0.14
		PM ₁₀	0.19	0.14
		PM _{2.5}	0.19	0.14
		SO ₂	0.37	0.27

Emission Sources - Maximum Allowable Emission Rates

- (1) Emission point identification - either specific equipment designation or emission point number from plot plan.
- (2) Specific point source name. For fugitive sources, use area name or fugitive source name.
- (3) VOC - volatile organic compounds as defined in Title 30 Texas Administrative Code § 101.1
 - H₂S - hydrogen sulfide
 - NO_x - total oxides of nitrogen
 - SO₂ - sulfur dioxide
 - PM - total particulate matter, suspended in the atmosphere, including PM₁₀ and PM_{2.5}, as represented
 - PM₁₀ - total particulate matter equal to or less than 10 microns in diameter, including PM_{2.5}, as represented
 - PM_{2.5} - particulate matter equal to or less than 2.5 microns in diameter
 - CO - carbon monoxide
- (4) Compliance with annual emission limits (tons per year) is based on a 12 month rolling period.
- (5) Emission rate is an estimate and is enforceable through compliance with the applicable special condition(s) and permit application representations.
- (6) Emission limits for EPN TANKCAP apply to total rolling 12-months emissions from all storage tanks identified in Special Condition 12.
- (7) Emission caps for tank floating roof loading activities apply to all floating roof tanks authorized by this permit (Identified in Special Condition 12).

Date: April 10, 2015

**PREVENTION OF SIGNIFICANT DETERIORATION PERMIT
FOR GREENHOUSE GAS EMISSIONS
ISSUED PURSUANT TO THE REQUIREMENTS AT 40 CFR § 52.21
U.S. ENVIRONMENTAL PROTECTION AGENCY, REGION 6**

PSD PERMIT NUMBER: PSD-TX-1398-GHG

PERMITTEE: Magellan Processing, L.P.
(Along with its affiliates)


FACILITY NAME: Condensate Splitter Plant
Corpus Christi Terminal

FACILITY LOCATION: 1802 Poth Ln
Corpus Christi, TX 78407

Pursuant to the provisions of the Clean Air Act (CAA), Subchapter I, Part C, 42 U.S.C. § 7470, *et seq.*, and the Code of Federal Regulations (CFR) Title 40, Section 52.21, and the Federal Implementation Plan at 40 CFR § 52.2305 (effective May 1, 2011 and published at 76 FR 25178), the U.S. Environmental Protection Agency, Region 6 is issuing a *Prevention of Significant Deterioration* (PSD) permit to Magellan Processing, L.P. (along with its affiliates, "Magellan") for Greenhouse Gas (GHG) emissions. The permit applies to the construction of a new condensate splitter at their existing facility located in Corpus Christi, Nueces County, Texas.

Magellan is authorized to construct a new condensate splitter plant as described herein, in accordance with the permit application (and plans submitted with the permit application), the federal PSD regulations at 40 CFR § 52.21, and other terms and conditions set forth in this PSD permit in conjunction with the corresponding Texas Commission on Environmental Quality (TCEQ) PSD permit No. PSD-TX-1398. Failure to comply with any condition or term set forth in this PSD permit may result in enforcement action pursuant to Section 113 of the CAA. This PSD permit does not relieve Magellan of the responsibility to comply with any other applicable provisions of the CAA (including applicable implementing regulations in 40 CFR Parts 51, 52, 60, 61, 72 through 75, and 98) or other federal and state requirements (including the state PSD program that remains under approval at 40 CFR § 52.2303).

In accordance with 40 CFR § 124.15(b)(3), this PSD permit becomes effective immediately upon issuance of this final decision.


Wren Stenger, Director
Multimedia Planning and Permitting Division

Dec. 4, 2014
Date

Magellan Processing, L.P. (along with its affiliates)
Prevention of Significant Deterioration Permit (PSD-TX-1398-GHG)
For Greenhouse Gas Emissions
Permit Conditions

PROJECT DESCRIPTION

Following the construction authorized by this permit, Magellan Processing, L.P. (along with its affiliates, "Magellan") will add a new 100,000 barrels per day (bbl/day) condensate splitter plant to their existing Corpus Christi Terminal in Corpus Christi, Nueces County, Texas. The existing Corpus Christi Terminal is a for-hire bulk petroleum storage terminal. Petroleum products and specialty chemicals are stored in various storage tanks and transferred in and out of the terminal tankage for external customers via pipeline, tank truck, railcar, and marine vessel. Magellan will construct the proposed condensate splitter plant in two phases. The proposed plant will have two trains each of which will process 50,000 bbl/day of hydrocarbon condensate material to obtain products suitable for commercial use including propane, butanes, light naphtha, heavy naphtha, kerosene, distillate, and resid (oil gas) product for sale to customers. The proposed plant will consist of a pre-fractionator column, a main fractionation column, heaters, a flare, vapor combustors, emergency engines, and 27 storage tanks.

EQUIPMENT LIST

The following devices are subject to this GHG PSD permit.

FIN	EPN	Description
H-1A H-2A	H-1A H-2A	Two fractionator heaters (Combustion Units). Each unit has a maximum firing rate of 128.9 MMBtu/hr and an annual average heat input rate of 117.2 MMBtu/hr and is fired with natural gas and fuel gas.
H-1B H-2B	H-1B H-2B	Two hot oil heaters (Combustion Units). Each unit has a maximum firing rate of 105.8 MMBtu/hr and an annual average input rate of 96.2 MMBtu/hr and is fired with natural gas and fuel gas.
H-4	H-4	One tank heater (Combustion Unit). The unit has a maximum and an annual average input rates of 16 MMBtu/hr and is fired with natural gas.
FL-1	FL-1	One flare (Combustion Unit). Used for control of routine, maintenance, startup and shutdown emissions and for emergency releases.
FWP1 FWP2	FWP1 FWP2	Two diesel-powered firewater pump engines (617 hp) for firewater pump. In addition to emergency fire suppression activities, each of the units is limited to 100 hours per 12-month rolling basis for maintenance and testing.
EMGEN1 EMGEN2	EMGEN1 EMGEN2	Two diesel-powered emergency generators (100 kW and 500 kW). In addition to emergency outages, each of the units is limited to 100 hours per 12-month rolling basis for maintenance and testing.
FUG-1	FUG-1	Process fugitives
MSSVCU	MSSVCU	One Maintenance, Startup and Shutdown vapor combustor (Combustion Unit)

I. GENERAL PERMIT CONDITIONS

A. PERMIT EXPIRATION

As provided in 40 CFR § 52.21(r), this PSD permit shall become invalid if construction:

1. is not commenced (as defined in 40 CFR §52.21(b)(9)) within 18 months after the approval takes effect; or
2. is discontinued for a period of 18 months or more; or
3. is not completed within a reasonable time.

Pursuant to 40 CFR § 52.21(r), EPA may extend the 18-month period upon a written satisfactory showing that an extension is justified.

B. PERMIT NOTIFICATION REQUIREMENTS

Permittee shall notify EPA Region 6 in writing or by electronic mail of the:

1. date construction is commenced, postmarked within 30 days of such date;
 2. actual date of initial startup, as defined in 40 CFR § 60.2, postmarked within 15 days of such date; and
 3. date upon which initial performance tests will commence, in accordance with the provisions of Section V, postmarked not less than 30 days prior to such date.
- Notification may be provided with the submittal of the performance test protocol required pursuant to Condition VI.B.

C. FACILITY OPERATION

At all times, including periods of startup, shutdown, and maintenance, Permittee shall, to the extent practicable, maintain and operate the facility including associated air pollution control equipment in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the EPA, which may include, but is not limited to monitoring results, review of operating maintenance procedures and inspection of the facility.

D. MALFUNCTION REPORTING

1. Permittee shall notify EPA in writing or by electronic mail within 48 hours following the discovery of any failure of air pollution control equipment, process equipment, or of a process to operate in a normal manner, which results in an increase in GHG emissions above the allowable emission limits stated in Section II and III of this permit.
2. Within 10 days of the restoration of normal operations after any failure described in I.D.1., Permittee shall provide a written supplement to the initial notification that

includes a description of the malfunctioning equipment or abnormal operation, the date of the initial malfunction, the period of time over which emissions were increased due to the failure, the cause of the failure, the estimated resultant emissions in excess of those allowed in Section II and III, and the methods utilized to mitigate emissions and restore normal operations.

3. Compliance with this malfunction notification provision shall not excuse or otherwise constitute a defense to any violation of this permit or any law or regulation such malfunction may cause.

E. RIGHT OF ENTRY

EPA authorized representatives, upon the presentation of credentials, shall be permitted:

1. to enter the premises where the facility is located or where any records are required to be kept under the terms and conditions of this PSD permit;
2. during normal business hours, to have access to and to copy any records required to be kept under the terms and conditions of this PSD permit;
3. to inspect any equipment, operation, or method subject to requirements in this PSD permit; and,
4. to sample materials and emissions from the source(s).

F. TRANSFER OF OWNERSHIP

In the event of any changes in control or ownership of the facilities to be constructed, this PSD permit shall be binding on all subsequent owners and operators. Permittee shall notify the succeeding owner and operator of the existence of the PSD permit and its conditions by letter; a copy of the letter shall be forwarded to EPA Region 6 within thirty days of the letter signature.

G. SEVERABILITY

The provisions of this PSD permit are severable, and, if any provision of the PSD permit is held invalid, the remainder of this PSD permit shall not be affected.

H. ADHERENCE TO APPLICATION AND COMPLIANCE WITH OTHER ENVIRONMENTAL LAWS

Permittee shall construct this project in compliance with this PSD permit, the application on which this permit is based, the TCEQ PSD Permit PSD-TX-1398 (when issued) and all other applicable federal, state, and local air quality regulations. This PSD permit does not release the Permittee from any liability for compliance with other applicable federal, state and local environmental laws and regulations, including the Clean Air Act.

I. ACRONYMS AND ABBREVIATIONS

API	American Petroleum Institute
BACT	Best Available Control Technology
CAA	Clean Air Act
CC	Carbon Content
CCS	Carbon Capture and Sequestration
CEMS	Continuous Emissions Monitoring System
CFR	Code of Federal Regulations
CH ₄	Methane
CO ₂	Carbon Dioxide
CO ₂ e	Carbon Dioxide Equivalent
DIB	Deisobutanizer
dscf	Dry Standard Cubic Foot
EF	Emission Factor
EPN	Emission Point Number
FIN	Facility Identification Number
FR	Federal Register
GHG	Greenhouse Gas
gr	Grains
GWP	Global Warming Potential
HHV	High Heating Value
hr	Hour
LAER	Lowest Achievable Emission Rate
lb	Pound
LDAR	Leak Detection and Repair
MMBtu	Million British Thermal Units
MSS	Maintenance, Start-up and Shutdown
NNSR	Nonattainment New Source Review
N ₂ O	Nitrous Oxides
NSPS	New Source Performance Standards
PSD	Prevention of Significant Deterioration
QA/QC	Quality Assurance and/or Quality Control
SCFH	Standard Cubic Feet per Hour
SCR	Selective Catalytic Reduction
TAC	Texas Administrative Code
TCEQ	Texas Commission on Environmental Quality
TPY	Tons per Year
USC	United States Code
VCU	Vapor Combustion Unit
VOC	Volatile Organic Compound
VRU	Vapor Recovery Unit

II. ANNUAL EMISSION LIMITS

Table 1. Annual Emission Limits Annual emissions, in tons per year (TPY) on a 365-day, rolling total, shall not exceed the following						
FIN	EPN	Description	GHG Mass Basis		CO ₂ e ^{1,2} (TPY)	BACT Requirements
				TPY ¹		
H-1A	H-1A	Fractionator Heater - Train 1	CO ₂	60,049	60,111	Minimum thermal efficiency of 85%. See permit condition III.B.1.o.
			CH ₄	1.13		
			N ₂ O	0.11		
H-1B	H-1B	Hot Oil Heater - Train 1	CO ₂	49,289	49,340	Minimum thermal efficiency of 85%. See permit condition III.B.1.o.
			CH ₄	0.93		
			N ₂ O	0.09		
H-2A	H-2A	Fractionator Heater - Train 2	CO ₂	60,049	60,111	Minimum thermal efficiency of 85%. See permit condition III.B.1.o.
			CH ₄	1.13		
			N ₂ O	0.11		
H-2B	H-2B	Hot Oil Heater - Train 2	CO ₂	49,289	49,340	Minimum thermal efficiency of 85%. See permit condition III.B.1.o.
			CH ₄	0.93		
			N ₂ O	0.09		
H-4	H-4	Tank Heater	CO ₂	4,099	4,103	Design thermal efficiency of 85%. Not to exceed 4,380 hours of equivalent full load operation on a 12-month rolling basis. See permit condition III.B.1.r
			CH ₄	0.075		
			N ₂ O	No Numerical Limit Established ³		
FL-1	FL-1	Flare	CO ₂	576	577	Good combustion practices. See permit condition III.B.2.
			CH ₄	0.02		
			N ₂ O	No Numerical Limit Established ³		
FWP1 FWP2	FWP1 FWP2	Diesel-powered Fire Water Pumps	CO ₂	64	64	Limit hours of non-emergency operation and good combustion practices. See permit condition III.B.5.
			CH ₄	No Numerical Limit Established ³		
			N ₂ O	No Numerical Limit Established ³		
EMGEN 1 EMGEN 2	EMGEN1 EMGEN2	Diesel-powered Emergency Generators	CO ₂	47	47	Limit hours of non-emergency operation and good combustion practices. See permit condition III.B.5.
			CH ₄	No Numerical Limit Established ³		
			N ₂ O	No Numerical Limit Established ³		
MSSVC U	MSSVCU	MSS Vapor Combustion Unit	CO ₂	2,645	2,648	Maintain a minimum combustion temperature. See permit condition III.B.4.
			CH ₄	0.056		
			N ₂ O	No Numerical Limit Established ³		

Table 1. Annual Emission Limits Annual emissions, in tons per year (TPY) on a 365-day, rolling total, shall not exceed the following						
FIN	EPN	Description	GHG Mass Basis		CO ₂ e ^{1,2} (TPY)	BACT Requirements
				TPY ¹		
FUG-1	FUG-1	Components Fugitive Leak Emissions	CH ₄	No Numerical Limit Established ⁴	No Numerical Limit Established ⁴	See permit condition III.B.3.
Totals ⁵			CO ₂	226,106	CO ₂ e 226,502 ⁶	
			CH ₄	10.565		
			N ₂ O	0.426		

1. The TPY emission limits specified in this table are not to be exceeded for this facility and include emissions from the facility during all operations and include MSS activities.
2. Global Warming Potentials (GWP): CO₂=1, CH₄ = 25, N₂O = 298, SF₆=22,800
3. All values indicated as "No Numerical Limit Established" are less than 0.01 TPY with appropriate rounding. The emission limit will be a design/work practice standard as specified in the permit.
4. Fugitive process emission from FUG-1 are estimated to be 6.42 TPY of CH₄ and 160 TPYCO₂e.
5. The total emissions for CH₄ and CO₂e include the PTE for process fugitive emissions of CH₄. The total emissions for CO₂e, also, include PTE emission of an existing tank heater (H-3). These totals are given for informational purpose only and do not constitute emission limits.
6. Two existing marine vessel loading vapor combustion units (EPNs: VCU1 and VCU2) and one existing tank heater (EPN: H-3) at the Corpus Christi Terminal will be used as part of the condensate splitter process but are not being physically modified themselves. They have a total estimated GHG emissions of 15,723 tpy CO₂e. As explained in the GHG Permitting Guidance, for the purposes of determining whether a PSD permits is required, the EPA requires a permitting authority to look beyond the emissions unit that is modified (across the entire source) to determine the extent of emission increases that result from the modification. However, the BACT applies only to the emission unit(s) that have been modified or added to the existing facility. See PSD and Title V permitting Guidance for Greenhouse Gases at 23. As a result, any additional GHG emissions from the condensate splitter process have been included in calculating the total tpy CO₂e to determine the PSD applicability. EPA will not, however, conduct a BACT analysis for the existing marine vessel loading vapor combustion units (VCU1 and VCU2) and tank heater (H-3) as part of this permit.

III. SPECIAL PERMIT CONDITIONS

A. Phased Construction

The proposed condensate splitter plant will consist of two trains each of which will process 50,000 bbl/day of hydrocarbon condensate material. Magellan is authorized to construct in two phases. Train 1 and Train 2 will be constructed in Phase 1 and Phase 2, respectively. Construction of the second 50,000 bbl/day train (Train 2) will commence within 18 months of the completion of the first 50,000 bbl/day train. The table below identifies under which phase of construction each emission point will be constructed.

Process Equipment Description	EPN	Construction Phase
Natural Gas Fired Fractionator Heater	H-1A	1
Natural Gas Fired Fractionator Heater	H-2A	2
Hot Oil Heater	H-1B	1
Hot Oil Heater	H-2B	2
Flare	FL-1	1
Tank Heater	H-3	Existing ¹
Tank Heater	H-4	1
Natural Gas Fugitives	FUG-1	1
Fire Water Pump Engine	FWP1	1
Fire Water Pump Engine	FWP2	1
Emergency Generator Engine	EMGEN1	1
Emergency Generator Engine	EMGEN2	1
Marine Vapor Combustor	VCU1	Existing ¹
Marine Vapor Combustor	VCU2	Existing ¹
MSS Vapor Combustor	MSSVCU	1

1. This emission unit is an existing non-modified unit. It is not subject to permit requirements since this unit will not be physically modified.

B. Emission Unit Work Practice Standards, Operational Requirements, and Monitoring

1. **Fractionator Heaters, Hot Oil Heaters and Tank Heater (EPNs: H-1A, H-2A, H-1B, H-2B, and H-4)**
 - a. Permittee shall calculate, on a daily basis, the amount of CO₂ emitted from combustion in tons/yr using equation C-5 in 40 CFR Part 98 Subpart C, converted to short tons. Compliance shall be based on a 365-day rolling total basis.
 - b. Permittee shall calculate the CH₄ and N₂O emissions on a 365-day rolling total basis. Permittee shall determine compliance with the CH₄ and N₂O emissions limits contained in this section using the default CH₄ and N₂O emission factors contained in Table C-2 and equation C-8 of 40 CFR Part 98 and the measured actual heat input (HHV), converted to short tons.

- c. Permittee shall calculate the CO_{2e} emissions on a 365-day rolling total basis, based on the procedures and Global Warming Potentials (GWP) contained in Greenhouse Gas Regulations, 40 CFR Part 98, Subpart A, Table A-1.
- d. Fuel for the heaters shall be limited to pipeline quality natural gas and produced off gas. The fuel gross calorific value (GCV) [high heat value (HHV)] of the fuel shall be determined, at a minimum, semiannually by the procedures contained in 40 CFR § 98.34(a)(6), and records shall be maintained of the semiannual fuel GCV for a period of five years. Upon request, Permittee shall provide a sample and/or analysis of the fuel that is fired in the heaters or shall allow a sample to be taken by EPA for analysis.
- e. The flow rate of the fuel combusted in natural gas-fired combustion emission units identified in this section shall be measured and recorded using an operational totalizing fuel flow meter at each inlet.
- f. Permittee shall perform cleaning of the burner tips annually, at a minimum.
- g. Permittee shall install, operate, and maintain an automated air/fuel control system.
- h. Permittee shall calibrate and perform preventative maintenance on the air/fuel control analyzers once per quarter, at a minimum.
- i. Permittee shall utilize insulation materials (e.g., ceramic fiber blankets and Kaolite™) where feasible to reduce heat loss.
- j. Permittee shall install, operate, and maintain an O₂ analyzer on heaters H-1A, H-1B, H-2A, and H-2B.
- k. Oxygen analyzers shall continuously monitor and record oxygen concentration in the heaters. It shall reduce the oxygen readings to an averaging period of 15 minutes or less and record it at that frequency.
- l. A relative accuracy test audit (RATA) is required once every four quarters in accordance with 40 CFR Part 60, Appendix F, Procedure 1, § 5.1.1.
- m. The oxygen analyzers shall be quality-assured at least quarterly using cylinder gas audits (CGAs) in accordance with 40 CFR Part 60, Appendix F, Procedure 1, § 5.1.2.
- n. The annual average firing rate of the fractionator heaters, hot oil heaters and tank heater shall not exceed 117.2 MMBtu/hr, 96.2 MMBtu/hr, and 16 MMBtu/hr, respectively. Compliance shall be based on a 365-day rolling average basis.
- o. The Permittee shall maintain a minimum overall thermal efficiency of 85% on a 12-month rolling average basis, calculated monthly, for each fractionator heater and each oil heater (H-1A, H-2A, H-1B, and H-2B) excluding periods of start-up, shutdown, and malfunction.
- p. The fractionator heaters and hot oil heaters (H-1A, H-2A, H-1B, and H-2B) will be continuously monitored for exhaust temperature, input fuel temperature, and stack oxygen. Thermal efficiency for emission units will be calculated for each operating hour from these parameters using equation G-1 from American Petroleum Institute (API) methods 560 (4th ed.) Annex G.
- q. The heaters are not expected to have GHG emissions in excess of the allowed emission rates during periods of startup, shutdown, or maintenance. The fuel firing rates will be below the maximum rate, and startups will be limited to 12 hours per event.
- r. The tank heater (H-4) shall not exceed 4,380 hours of equivalent full load operation on a 12-month rolling basis.

2. Flare (EPN: FL-1)

- a. The flare shall only combust pipeline natural gas in the pilots during normal operations.
- b. The flare shall be air assisted.
- c. Permittee shall install, operate, and maintain a flow rate and composition (total VOC or btu content) analyzer to monitor the waste gas combusted by the flare. The flow rate and composition analyzer shall continuously record the molecular weight and mass flow rate of the flare gas.
- d. The flare shall have a minimum destruction and removal efficiency (DRE) of 98 % for VOC and 99% for methane, based on flow rate and gas composition measurements.
- e. Permittee must record the inlet waste gas heat input (HHV) in MMBtu/hr during flare operation. The records must include hourly CH₄ emission levels as measured by the in-line gas analyzer (Gas chromatograph or equivalent with inlet gas flow rate) and the calculations based on the actual heat input for the CO₂, N₂O, and CH₄ emissions. These records must be kept for five years following the date of each event.
- f. The flare shall be designed and operated in accordance with 40 CFR § 60.18 including specifications of minimum heating value of the waste gas, maximum tip velocity, and pilot flame monitoring. An infrared monitor is considered equivalent to a thermocouple for flame monitoring purposes.
- g. Permittee shall calculate the amount of CO₂ emissions using equation Y-1a found in 40 CFR § 98.253(b)(1)(ii)(A). CH₄ and N₂O emissions are calculated using equations Y-4 and Y-5 as found in 40 CFR Part 98, Subpart Y.

3. Process Fugitives (EPN: FUG-1)

- **Components Fugitive Leaks Work Practice and Operation Requirements:**

- a. The Permittee shall implement TCEQ 28 VHP LDAR program under the permit issued by TCEQ for non-GHG pollutants for fugitive emissions control for process lines in VOC service. The leak thresholds, repair requirements, and record keeping requirements shall be consistent with the TCEQ air permit requirements for VOC emissions.
- b. The Permittee shall implement an audio, visual, and olfactory (AVO) method for detecting leaks in natural gas piping components and fugitive emissions of methane for process lines not in VOC service but containing methane.
- c. The Permittee shall:
 - i. Perform the AVO monitoring daily; and
 - ii. Maintain a written log of daily inspection identifying the operating area inspected, fuel gas and natural gas equipment inspected (valves, lines, flanges, etc.), whether any leaks were identified by audible, visual or olfactory inspections and corrective actions/repairs taken.
- d. The Permittee shall take for the following action for identified leaks immediately upon detection of the leak:
 - i. Tag the leaking equipment device; and

- ii. Commence repair or replacement of the leaking component as soon as practicable, but no later than 30 days after detection. All leaking components which cannot be repaired until a scheduled shutdown shall be identified for such repair by tagging within 30 days of the detection of the leak. A listing of all components that qualify for delay of repair shall be maintained on a delay of repair list.

4. Maintenance, Startup and Shutdown Vapor Combustion Unit (EPN: MSSVCU)

- a. The VCU shall have an initial stack test to verify the proper combustion chamber temperature to ensure a destruction and removal efficiency of at least 99.5%. During subsequent operations, if the waste process gas flow rate to the VCU is greater than that recorded during the test period, stack sampling shall be performed at the new operating conditions within 120 days.
- b. For burner combustion, natural gas fuel usage (scf) is recorded using an operational totalizing flow meter at the MSSVCUs.
- c. The flow rate of the VOC gas combusted shall be measured and recorded using an operational totalizing flow meter at the MSSVCU.
- d. VOC flow to the MSSVCU resulting from MSS activities shall be calculated using the physical and chemical properties of the material being combusted. The data will be used to calculate GHG emissions to show compliance with the limits specified in Table 1.
- e. Permittee shall calculate CO₂ emissions, on a monthly basis, using equation C-1 consistent with 40 CFR § 98.33(a)(1)(i).
- f. Permittee shall perform periodic maintenance on the MSSVCU annually, at a minimum, or more often as recommended by the manufacturer specifications.
- g. Permittee shall maintain the combustion temperature above 1400 °F or the most recent stack temperature in accordance with Special Condition 16 of the TCEQ NSR permit No. 56470. Temperature monitoring of the MSSVCU combustion chamber will ensure proper operation.
- h. Permittee shall install and maintain a temperature recording device with an accuracy of the greater of ± 0.75 percent of the temperature being measured expressed in degrees Celsius or $\pm 2.5^{\circ}\text{C}$.
- i. The MSSVCU combustion chamber temperature shall be continuously monitored and recorded when VOC gas is directed to the MSSVCU from MSS activities. The temperature measurement devices shall reduce the temperature readings to an averaging period of 15 minutes or less and record it at that frequency.

5. Diesel-Powered Firewater Pump Engines and Emergency Generators (EPNs: FWP1, FWP2, EMGEN1 and EMGEN2)

- a. The firewater pump engines and emergency generators will utilize diesel as fuel.
- b. Each of the firewater pump engine and emergency generator shall not exceed 100 hours of non-emergency operation on a 12-month rolling basis and shall be operated and maintained in accordance with the manufacturer's recommendations. Compliance with the 100 hour non-emergency operational requirement is determined on a 12 month rolling basis.

- c. Permittee shall install and maintain an operational non-resettable elapse time meter for the firewater pump engines and emergency generators.
- d. The engines and generators shall meet the applicable monitoring and recordkeeping requirements as required in 40 CFR Part 60, Subpart IIII, Standards of Performance for Stationary Compression Ignition Internal Combustion Engines.
- e. Permittee shall maintain a file of all records, data measurements, reports and documents related to the operation of the firewater pump engines and emergency generators, including, but not limited to, the following: all records or reports pertaining to maintenance performed, all records relating to performance tests and monitoring of the firewater pump engines and emergency generators; fuel usage, and hours of operation required in Special Conditions III.B.5.a and III.B.5.b; and all other information required by this permit recorded in a permanent form suitable for inspection. The file must be retained for not less than five years following the date of such measurements, maintenance, reports, and/or records.

6. Maintenance, Startup, and Shutdown (MSS) Activities (EPN: MSS)

- a. Carbon Canisters and/or Scrubbers
 - Carbon canisters and/or scrubbers shall be utilized to control MSS emissions associated with vacuum trucks, frac tanks, and any other process equipment that is not connected to the flare or vapor combustion unit. All the recovered VOC emissions shall be displaced to the flare.

C. Continuous Emissions Monitoring Systems (CEMS)

- 1. As an alternative to Special Condition III.B.1.a. Permittee may install a CO₂ CEMS and volumetric stack gas flow monitoring system with an automated data acquisition and handling system for measuring and recording CO₂ emissions discharged to the atmosphere, and use these values to show compliance with the annual emission limit in Table 1.
- 2. If this alternative is adopted, Permittee shall ensure that all required CO₂ monitoring system/equipment are installed and all certification tests are completed on or before the earlier of 90 unit operating days or 180 calendar days after the date the unit commences operation.
- 3. Permittee shall ensure compliance with the specifications and test procedures for CO₂ emission monitoring system at stationary sources, 40 CFR Part 75, or 40 CFR Part 60, Appendix B, Performance Specification numbers 1 through 9, as applicable. Permittee shall meet the appropriate quality assurance requirements specified in 40 CFR Part 60, Appendix F for the CO₂ emission monitoring system.

IV. Recordkeeping and Reporting

- 1. In order to demonstrate compliance with the GHG emission limits in Table 1, Permittee will monitor the following parameters and summarize the data on a calendar month basis.
 - a. Operating hours for all air emission sources;
 - b. The natural gas fuel usage for all combustion sources, using continuous fuel flow monitors (a group of equipment can utilize a common fuel flow meter, as long as actual fuel usage is allocated to the individual equipment based upon actual operating hours); and

- c. Annual fuel sampling for natural gas, and quarterly sampling of waste gas at a minimum.
2. Permittee shall maintain all records, data, measurements, reports, and documents related to the operation of the facility, including, but not limited to, the following: all records or reports pertaining to maintenance performed on any system or device at the facility; duration of startup, shutdown; the initial startup period for the emission units; pollution control units; malfunctions; all records relating to performance tests, calibrations, checks, and monitoring of combustion equipment; duration of an inoperative monitoring device and emission units with the required corresponding emission data; and all other information required by this permit recorded in a permanent form suitable for inspection. The records must be retained for not less than five years following the date of such measurements, maintenance, reports, and/or records.
3. Permittee shall maintain records of all GHG emission units and CO₂ emission certification tests and monitoring and compliance information required by this permit.
4. Permittee shall maintain records and submit a written report of all excess emissions to EPA semi-annually, except when: more frequent reporting is specifically required by an applicable subpart; or the Administrator or authorized representative, on a case-by-case basis, determines that more frequent reporting is necessary to accurately assess the compliance status of the source. The report is due on the 30th day following the end of each semi-annual period and shall include the following:
 - a. Time intervals, data and magnitude of the excess emissions, the nature and cause (if known), corrective actions taken and preventive measures adopted;
 - b. Applicable time and date of each period during which the monitoring equipment was inoperative (monitoring down-time);
 - c. A statement in the report of a negative declaration; that is; a statement when no excess emissions occurred or when the monitoring equipment has not been inoperative, repaired or adjusted; and
 - d. Any failure to conduct any required source testing, monitoring, or other compliance activities.
5. Excess emissions shall be defined as any period in which the facility emissions exceed a maximum emission limit set forth in this permit.
6. Excess emissions indicated by GHG emission source certification testing or compliance monitoring shall be considered violations of the applicable emission limit for the purpose of this permit.
7. All records required by this PSD permit shall be retained and remain accessible for not less than 5 years following the date of such measurements, maintenance, and reporting.

V. Initial Performance Testing Requirements:

- A. Permittee shall perform an initial stack test to establish the actual quantities of air contaminants being emitted into the atmosphere from emission units (H-1A, H-1B, H-2A, H-2B, and H-4) and to determine the initial compliance with the CO₂ emission limits established in this permit. Sampling shall be conducted in accordance with 40 CFR § 60.8 and EPA Method 3a or 3b, in 40 CFR 60 Appendix B, for the concentration of CO₂ for the heaters.

1. For the Hot Oil, Fractionator and Tank Heaters calculate the CO₂ hourly average emission rate determined under maximum operating test conditions, convert to lbs of CO₂/MMBtu. Use the following equation to calculate the annual emissions.

$$\text{CO}_2 \text{ TPY} = 2 * (\text{DV}) * (8,760 \text{ hr/yr}) * (\text{lb CO}_2/\text{MMBtu})$$

Where:

DV = Design annual average furnace firing rate (MMBtu/hr) upon which the emissions in Table 1 were based on.

lb CO₂/MMBtu = Calculated from VI.A.

- B. Permittee shall conduct an evaluation of the thermal efficiency of the heaters (H-1A, H-1B, H-2A, and H-2B) to verify compliance with minimal thermal efficiency requirements at III.B.1.n when performing testing as stated in V.A. The results of the thermal efficiency evaluation shall be submitted to the EPA within 30 days of testing.
- C. Within 60 days after achieving the maximum production rate at which the affected facility will be operated, but not later than 180 days after initial startup of the facility, performance tests(s) must be conducted and a written report of the performance testing results furnished to the EPA. Additional sampling may be required by EPA.
- D. Permittee shall submit a performance test protocol to EPA no later than 30 days prior to the test to allow review of the test plan and to arrange for an observer to be present at the test. The performance test shall be conducted in accordance with the submitted protocol, and any changes required by EPA.
- E. Performance testing must be conducted using flow rates that are comparable to the normal operating flow rates.
- F. Fuel sampling for emission unit FL-1 (flare) shall be conducted in accordance with 40 CFR Part 98.
- G. Flare compliance determinations shall be made following the requirements in 40 CFR § 65.147(b)(3)(i-iv).
- H. The MSS vapor combustion unit will be stack tested in accordance with Special Condition 16 of the TCEQ NSR permit No. 56470. Stack testing will establish the minimum combustion chamber temperature for the VCU. Stack testing will be performed initially and within 120 days of a process flow change. Magellan will provide EPA with a copy of the stack testing results for review and approval.
- I. Performance tests must be conducted under such conditions to ensure representative performance of the affected facility. The owner or operator must make available to the EPA such records as may be necessary to determine the conditions of the performance tests.

- J. The owner or operator must provide the EPA at least 30 days' prior notice of any performance test, except as specified under other subparts, to afford the EPA the opportunity to have an observer present and/or to attend a pre-test meeting. If there is a delay in the original test date, the facility must provide at least 7 days prior notice of the rescheduled date of the performance test.
- K. The owner or operator shall provide, or cause to be provided, performance testing facilities as follows:
 - 1. Sampling ports adequate for test methods applicable to this facility,
 - 2. Safe sampling platform(s),
 - 3. Safe access to sampling platform(s), and
 - 4. Utilities for sampling and testing equipment.
- L. Unless otherwise specified, each performance test shall consist of three separate runs using the applicable test method. Each run shall be conducted for the time and under the conditions specified in the applicable standard (i.e., 40 CFR § 60.8 and EPA Method 3a or 3b, in 40 CFR 60 Appendix B). For purposes of determining compliance with an applicable standard, the arithmetic mean of the results of the three runs shall apply. Emissions testing, as outlined above, shall be performed within 120 days of a process flow change, to verify continued performance at permitted emission limits.

VII. Agency Notifications

Permittee shall submit GHG permit applications, permit amendments, and other applicable permit information to:

Multimedia Planning and Permitting Division
EPA Region 6
1445 Ross Avenue (6 PD-R)
Dallas, TX 75202
Email: Group R6AirPermits@EPA.gov

Permittee shall submit a copy of all compliance and enforcement correspondence as required by this Approval to Construct to:

Compliance Assurance and Enforcement Division
EPA Region 6
1445 Ross Avenue (6EN)
Dallas, TX 75202

